PART 70 PERMIT to OPERATE . 9584-01 Southern California Gas Company — La Goleta Station

SIC # 49

SOUTHERN CALIFORNIA GAS COMPANY 1171 MORE ROAD GOLETA, CA 93117 STATIONARY SOURCE ID # 5019

OPERATOR

Southern California Gas Company (The Gas Company)

<u>OWNERSHIP</u>

Southern California Gas Company (The Gas Company)

RESPONSIBLE OFFICIAL

Jack Ford, Superintendent La Goleta Station Southern California Gas Company



APCO: Doug Allard Date: January 12, 1998

PART 70 PERMIT -- SO. CAL. GAS, La GOLETA

G:\group\engr\wp\pt70srce\permits\o&g-stor\socalgas.doc

TABLE OF CONTENTS:

			PAGE	
1.0	STATI	ONARY SOURCE INTRODUCTION		
	1.1	Introduction		7
	1.2	Stationary Source Overview		7
	1.3	Emission Units Overview		9
	1.4	Control Technology Review		9
	1.5	Emission Reduction Credits Overview		9
2.0	PROCI	ESS DESCRIPTION		
	2.1	Overall Process Summary		10
	2.2	Support Systems		10
	2.3	Maintenance Activities		10
	2.4	Activities/Other Processes		10
	2.5	Detailed Process Equipment		10
3.0	REGUI	LATORY REVIEW		
	3.1	Rule Exemptions Claimed		11
	3.2	Compliance with Applicable Federal Rules		15
	3.3	Compliance with Applicable State Rules	15	
	3.4	Compliance with Applicable APCD Rules		15
4.0	ENGIN	EERING ANALYSIS		
	4.1	General		17
	4.2	Emissions Analysis		17
	4.3	Compliance Assurance Monitoring		21
	4.4	Control Technology including BACT		21
	4.5	Source Testing/Sampling/Calibration Requirements		21
5.0		IONS (EMISSION UNITS/FACILITIES/STATIONARY SOURCE)		
	5.1	General Service A No. F. district A 1000 (GGNE) 200		21
	5.2	Stationary Source Net Emissions Increase, baseline 1990 (SSNEI - 90)		22
	5.3	Permitted Emission Limits — Emission Units		22
	5.4	Permitted Emission Limits — Facility/Source Totals		22
	5.5	Exempt Emission Sources		22
	5.6	Federal Potential to Emit for Entire Source		22
6.0	AIR Q	UALITY IMPACT ANALYSIS		27
7.0	_	CONSISTENCY and OFFSET REQUIREMENTS		
	7.1	General		27

Page 1 of 88 Pages SoCalGas: La Goleta Plant

	7.2	Air Quality Attainment Plan	27
	7.3	Offset Requirements ERC Source Verifications	27
	7.4	ERC Source Verifications	28
8.0	LEAD	AGENCY PERMIT CONSISTENCY	28
9.0	PERM	IIT CONDITIONS	
	9.1	Conditions for Permitted IC Engines at La Goleta	29
	9.1.A	Generic Emission/Operation Limits	31
	9.1.B	Specific Emission/Operation/Offset Maintenance Limits	36
	9.1.C	Compliance Monitoring including Source Testing 41	
	9.1.D	Recordkeeping	47
	9.1.E	Reporting	49
	9.2	Conditions for Permitted Dehydration/Storage/Metering Units at La Goleta	50
	9.2.A	•	53
	9.2.B	-	54
	9.2.C	1	55
	9.2.D	1	56
	9.2.E	Reporting	56
	9.3	Conditions for Permitted Boilers at La Goleta	57
	9.3.A	Generic Emission/Operation Limits	57
	9.3.B	Specific Emission/Operation Limits	59
	9.3.C	•	60
	9.3.D		62
	9.3.E	Reporting	62
	9.4	Conditions for Permitted Thermal Oxidizers at La Goleta	63
	9.4.A		63
	9.4.B	Specific Emission/Operation Limits	65
	9.4.C	Compliance Monitoring	66
	9.4.D	Recordkeeping	67
	9.4.E	Reporting	67
	9.5	Conditions for Permitted Automotive Refueling Facility at La Goleta	68
	9.5.A	Generic Emission/Operation Limits	68
	9.5.B	Specific Emission/Operation Limits	69
	9.5.C	Compliance Monitoring	70
	9.5.D	Recordkeeping	70
	9.4.E	Reporting	70
			_

Page 2 of 88 Pages

	9.6	Insigni	ficant Emission Units List (LIST ONLY)	71	
	9.7	Standa	ard Administrative Conditions		72
	9.8	"APCI	D-Only" Permit Conditions		77
10.	ATTA	CHMEN	NTS		87
	10.1		Appendix 1		88
	10.1.A 10.1.B		PTO 6819 PTO 7500		
	10.1.C	:.). PTO 8	PTO 8008		
	10.1.E		PTO 8946.		
	10.1.F		PTO 9075		
	10.1.G		PTO 9162		
	10.1.H	[. PTO 9	275		
	Form 1	1302-I	Compliance Plan for La Goleta		
	Form 1	1302-J	Compliance Plan Certification for La Goleta		
	10.2		APCD Engineering Analysis for PTOs		1
	10.3		Appendix 2: List of Equipment and Associated Emissions	2	

Page 3 of 88 Pages

LIST OF FIGURES AND TABLES

PAGE NUMBER.

Page 4 of 88 Pages SoCalGas: La Goleta Plant

Figure 1.1 **Stationary Source** 8 Table 3.1 Existing Environmentally non-significant APCD PTO Conditions 11 Table 3.2 Applicable APCD Rules 15 Table 4.2.1 HAP Emissions Factors : Gas-fired IC Engines 18. Table 4.2.2 HAP Emissions Factors: Gas & Diesel-fired IC Engines 19 HAP Emissions Factors: Boilers and Flares Table 4.2.3 20 Table 5.2 Facility/Source Net emissions Increase (SSNEI 90) 23 Table 5.3 Emission Unit/Facility/Source Permitted Emissions (SSPTE) 24 Stationary Source Exempt Emissions Total (SSXMT) Table 5.4 25 Stationary Source Potential to Emit (70PTE) Table 5.5 26 29 Table 9.1.1 IC Engine Equipment List & Applicable Rules Table 9.1.2 IC Engine Applicable Generic Requirements 31 IC Engine Applicable Unit-Specific Requirements Table 9.1.3 33 IC Engine Source Testing Requirements Table 9.1.4 42 Table 9.2.1 Dehydration/Storage/Metering Equipment List & Applicable Rules 50 Table 9.2.2 Dehydration/Storage/Metering Applicable Generic Requirements 53 Dehydration/Storage/Metering Applicable Unit-Specific Requirements Table 9.2.3 54 Table 9.3.1 Boilers Equipment List & Applicable Rules 57 Boilers Applicable Generic Requirements 57 Table 9.3.2 Table 9.3.3 Boilers Applicable Unit-Specific Requirements 58 Table 9.4.1 Thermal Oxidizers Equipment List & Applicable Rules 63 Thermal Oxidizers Applicable Generic Requirements Table 9.4.2 63 Table 9.4.3 Thermal Oxidizers Applicable Unit-Specific Requirements 64 Table 9.5.1 Automotive Refueling Facility Equipment List & Applicable Rules 68 Automotive Refueling Facility Applicable Generic Requirements 68 Table 9.5.2 Table 9.5.3 Automotive Refueling Facility Applicable Unit-Specific Requirements 69 Table 9.6 71 Insignificant Emission Units List

ABBREVIATIONS AND ACRONYMS

AFR Air to Fuel Ratio

AOS alternative operating scenario

AP-42 USEPA's Compilation of Emission Factors (5th Ed.-1995) w/supplement A

APCD (Santa Barbara County) Air Pollution Control District

API American Petroleum Institute

ASTM American Society for Testing Materials

ATC Authority to Construct (pre-construction permit from State)

BACT best available control technology bpd barrels per day (1 barrel = 42 gallons)

bhp brake horsepower
Btu British Thermal Unit

BSFC brake specific fuel consumption (value)

°C degree Celsius

CAAA Clean Air Act Amendments (federal)
CEM continuous emission monitoring
CFR Code of Federal Regulations

CO carbon monoxide dscf dry standard cubic foot

EU emission unit

°F degree Fahrenheit
FR Federal Register

g gram gal gallon

GC/FID gas chromatography/flame ionization detector

gr grain

HAP hazardous air pollutant, as defined by CAAA, Section 112(b)

HHV higher heating value H_2S hydrogen sulfide

IC internal combustion (engines)
I&M inspection & maintenance

k kilo (thousand)

l liter

LDAR leak detection and repair (program), also termed by the APCD as I&M

lb pound

lbs/hrpounds per hourLHVlower heating valueLPGliquid petroleum gas

M mega (million), used as prefix with scientific units, e.g., calories or joules

Page 5 of 88 Pages

SoCalGas: La Goleta Plant

m mete

MACT Maximum Available Control Technology

MM million (a thousand thousand), used as prefix with British units, e.g., Btu

MSDS material safety data sheet

MW molecular weight

NESHAP National Emission Standards for Hazardous Air Pollutants

NEI net emissions increase

NG natural gas

NOx oxides of nitrogen (calculated as NO₂)
NSCR non-Selective Catalytic Reduction
NSPS New Source Performance Standards

O₂ oxygen

OCS outer continental shelf

ODC (stratospheric) ozone-depleting compounds Part 70 Code of Federal Regulations, Vol. 40, Part 70

PFD process flow diagram

P&ID piping & instrumentation diagram PC(D or T) pollution control (device or technology)

PM particulate matter

 PM_{10} particulate matter ≤ 10 microns (measured median aerodynamic diameter)

ppm(vd or w) parts per million (volume dry or weight psia pounds per square inch absolute psig pounds per square inch gauge

PRD pressure relief device PSV pressure safety valve

PTO Permit to Operate (operating permit issued by State)

PVRV pressure vacuum relief valve

RACT reasonably available control technology RMP risk management plan (Federal)

ROC reactive organic compounds, synonymous with "VOC" used in this permit

RVP Reid vapor pressure

SBCAPCD Santa Barbara County Air Pollution Control District

scf standard cubic foot

scfd standard cubic feet per day scfm standard cubic feet per minute SIP State Implementation Plan

SO₂ sulfur dioxide

STP standard temperature (60°F) and pressure (29.92 inches of mercury)

TPQ tons per quarter
TPY tons per year
TVP true vapor pressure

USEPA United States Environmental Protection Agency

VE visible emissions

VOC volatile organic compounds, also known as "ROC" throughout California

Page 6 of 88 Pages

SoCalGas: La Goleta Plant

VRS vapor recovery system

W watt

1.0 STATIONARY SOURCE INTRODUCTION

1.1 Introduction

The Santa Barbara County Air Pollution Control District (APCD) is responsible for implementing all applicable federal, state and APCD air pollution requirements which affect any major stationary source of air pollution in Santa Barbara County. These requirements include federal regulations listed in 40 CFR Parts 50 (Ambient AQ Standards), 51 (State Implementation Plan), 52 (PSD Review), 55 (Outer Continental Shelf Rules), 60 (New Source Performance Standards), 61 (National Emission Standards for Hazardous Air Pollutants), 63 (HAP Control Technology Standards), 68 (Emergency Release Rules), 70 (Operating Permit Program) and 82 (Ozone Strategy Rules).

The issuance of this Part 70 permit to the **Southern California Gas, La Goleta Plant,** a major stationary source for VOC, NOx and CO, satisfies the permit issuance requirements of the Part 70 operating permit program. Conditions listed in the permit are based on applicable federal requirements. *All conditions in Section 9 of this permit are federally enforceable and enforceable by the public under the Clean Air Act, except the conditions listed in Section 9.7.B as "APCD-only Enforceable."*

Pursuant to the stated aims of Title V of the Clean Air Act of 1990, this permit has been designed to meet two objectives. First, compliance with all conditions in this permit by the permittee should be sufficient to comply with all "applicable" requirements for the permittee. Next, the permit should constitute a comprehensive compliance assurance document to be used to implement all "applicable" requirements — for the permittee, the regulatory agencies and the public.

A summary of the main sections of the Part 70 operating permit 9584 is presented in the following pages for a quick assessment of the stationary source itself.

1.2 Stationary Source Overview

The **La Goleta Stationary Source (SSID # 5019)** is solely owned and operated by Southern California Gas Company (referred to hereafter as "SoCalGas"), a subsidiary of Pacific Enterprises, with the company regional headquarters located in downtown Los Angeles, CA. The source, consisting of a number of natural gas compressors and an underground natural gas storage reservoir, is located in Goleta, CA, with a postal address of 1171 More Road, Goleta, 93117. For APCD regulatory purposes, the source location is in the Southern Zone of the Santa Barbara County (ref.: APCD Rule 102, Def. "Southern Zone"). The County is designated as an ozone non-attainment area. Figure 1-1 provides a site map depicting the source location and the main emission units.

Page 7 of 88 Pages

SoCalGas: La Goleta Plant

Details of the equipment, processes and operations at the La Goleta stationary source can be

Fig. 1.1 Site Map of SoCalGas La Goleta Plant at More Mesa, Santa Barbara

Page 8 of 88 Pages

found in APCD-issued Permits to Operate (PTOs) 6819, 7500, 8008, 8166, 8946, 9075, 9162 and 9275 (all issued in 6/97). The relevant sections are "Facility (or Equipment) Description" sections in these PTOs. A copy of each of these PTOs is included in Section 10, Appendix 1 of this document.

1.3 Emission Units (EU) Overview

The emissions at the La Goleta Stationary source come from the following source categories:

Natural Gas Compression/Cooling Units — consisting of eight large compressors and ten cooling fans driven by gas-fired IC engines;

Natural Gas Dehydration/Storage/Transmission Units — consisting of sand traps, glycol dehydrator units, heat exchangers, rectifiers, separators, electric motor-driven pumps, injection wells and glycol storage tanks;

Support Service Units — consisting of two boilers, three thermal oxidizer/flares, one IC engine driving an emergency electrical power generator, a tank farm for storing hydrocarbon (HC) liquids and brine water separated from incoming/outgoing natural gas, HC liquid loading station, methanol storage tank and a gasoline service station.

A list of all emission units, their operator-provided IDs, and individual unit ratings is provided by Tables 9.1.a through 9.5.a. A list of insignificant emissions units, which are not regulated under federally-applicable requirements, is provided in Table 9.6.

Section 4 provides an engineering analysis of these emission sources. Section 5 tabulates the allowable emissions listed in each APCD permit, net emissions increase reflected by each APCD permit and the potential to emit for the stationary source itself.

1.4 Control Technology Overview

Seven of the eight engines driving gas compressors, four engines driving power generators and seven engines driving fans are equipped with non-selective catalytic reduction (NSCR) units; the other engine driving the largest gas compressor is equipped with clean-burn technology. Eleven of the NSCR-controlled units are assisted by air-fuel ratio (AFR) controllers. VOC wastes from the glycol dehydration units and the HC liquid storage tanks are disposed using three thermal oxidizer flares.

1.5 Emission Reduction Credits Overview

NOx emission reductions achieved by the NSCR units at seven gas compressors are used as NOx emission offsets by Chevron USA Inc. to meet their offset requirements at their Point Arguello Project. These emission reduction credits are valid for the life of the Point Arguello project. None of these emission reduction credits may be used for other projects including those implemented by SoCalGas, without prior approval by the APCD.

PROCESS DESCRIPTION

2.1 Overall Process Summary

A complete description of the natural gas compression and cooling processes can be found in the Section titled "Process Description" in existing SoCalGas APCD PTOs 7500, 8008, 8946, 9075 and 9162 included in Appendix 1. Descriptions of the natural gas dehydration, storage and transmission processes are listed in the "Process Description" section of the APCD PTO 8166, also included in Appendix 1.

Page 9 of 88 Pages

2.2 Support Systems

Support service activities are described in the "Process Description" section of the SoCalGas APCD PTOs 6819 and 9275 included in Appendix 1.

2.3 Maintenance Activities

Surface Coating Activities — Surface coating operations are conducted throughout the facility for occasional structural and equipment maintenance needs, including architectural coating (refer to page 15, Part 70 permit application #9584 submitted by SoCalGas).

Wipe Cleaning/Degreasing Operations — Wipe cleaning is performed throughout the facility for occasional structural and equipment maintenance needs. Also, a Safe-T-Kleen cold solvent cleaner unit is used at the facility for degreasing operations (refer to page 15, Part 70 permit application #9584 submitted by SoCalGas).

2.4 Activities/Other Processes

Vehicle refueling activities at the stationary source are described in the "Process Description" section of the APCD PTO 6819 (see Appendix 1). Short-term activities, e.g, well drilling or temporary operation and maintenance, which may occur at this facility in the future will comply with all applicable rules. Also, periodic shutdown followed by startup and malfunctions may occur. No other long-term activities at the stationary source are subject to Part 70 permitting, based on APCD Regulation XIII requirements and the Part 70 permit application # 9584 information.

2.5 Detailed Process Equipment Listing

See Section 9 or Section 10 equipment tables for a complete listing of all permitted emission units.

REGULATORY REVIEW

This section identifies all applicable federal, state and APCD requirements for the La Goleta source.

Page 10 of 88 Pages

3.1 Rule Exemptions Claimed

SoCalGas did not claim broad exclusion from any applicable federal, state or APCD rules, regulations or standards in its Part 70 permit application 9584 (Note that, certain emission units at the La Goleta Plant are exempt from a number of APCD Rules or Rule provisions; these exemptions are listed elsewhere in this Part 70 permit, as applicable).

In their April 21, 1996 memo to the APCD, SoCalGas requested a comprehensive "permit shield" for 58 current permit conditions in their Part 70 application # 9584. Under the APCD Rule 1303.E.1 and per White Paper I guidance, SoCalGas needs to provide adequate justification for requesting the permit shield. In other words, they must indicate why the federally-enforceable conditions for which the shield is sought should no longer apply to them. For example, they can point to existing permit conditions that are more stringent than the "shield-requested" conditions, thus effectively superseding the shield-requested conditions. Alternately, they can point out why the shield-requested conditions are not relevant to the permit. For the majority of the shield requests, SoCalGas has failed to provide appropriate reasoning why the shield-requested conditions no longer apply to SoCalGas operations at the plant or to their Part 70 permit. The APCD, therefore, has not provided any shield to these conditions. However, a number of requested conditions have been deemed as either environmentally insignificant or non-federallly enforceable (the former being deleted and the latter listed as "APCD-only" enforceable). Also, any conditions duplicated in the administrative condition Section 9.7 are deleted.

A brief analysis of the shield-requested conditions and related information follows:

Table 3.1 -- Existing Environmentally Non-significant APCD PTO Conditions

APCD PTO#	Cond. #	SoCalGas Listed Reason for Permit 'shield'	APCD Analysis of SoCalGas Information
PTO 7500	1- Consist w/analy.	Construction complete; operational requirements covered elsewhere.	Agreed; similar conditions exist in this permit in Section 9.7.A.(1). DELETED.
	2-ERC dedicn to project	No operational or M-R-R requirements contained in this provision.	This is an ERC-related admin condition and is enforceable by the APCD-only. <i>Moved to Section 9.7.B.</i>
	3-Shifts in Load	Condition not derived from SIP; also,does not address specific equipmt. So unenforceable.	This is an ERC-related admin condition and is enforceable by the APCD-only. <i>Moved to Section 9.7.B.</i>
	4-Permit Revocn.	Admin. cond. covered elsewhere in PTO 7500-03.	Agreed; a similar condition exists in this permit in Section 9.7.A.(1). DELETED.
	6-Access to facility	No operational or M-R-R requirements contained herein.	Disgree; but identical condition in this permit in Section 9.7.A.(4). DELETED.
	7-Compl. Coord.	No operational or M-R-R requirements contained herein.	Agreed; this is a "project" condition no longer relevant to the PTO. DELETED.
	8-Permit Accept.	No operational or M-R-R requirements contained herein.	Disagree; but identical condition in this permit in Section 9.7.A.(11). DELETED.
	9-Sever- ability	No operational or M-R-R requirements contained herein.	Disagree; but identical condition in this permit in Section 9.7.A.(5). DELETED.
	10- Confl.	No operational or M-R-R requirements contained herein.	Disagree; but identical condition in this permit in Section 9.7.A.(15). DELETED.

Page 11 of 88 Pages

bet.cond.	

APCD	Cond. #	SoCalGas Listed Reason for	APCD Analysis of SoCalGas Information			
PTO#		Permit 'shield'	111 02 11111J22 01 00 011 011 1110111111011			
PTO 7500-	11-Viol.	No operational or M-R-R	Agreed: APCD will list this as 'APCD-only'			
03	of Reg.	requirements contained herein.	cond.			
	12-Cost-	No operational or M-R-R	This ERC-related admin. cond. is required			
	reimburs	requirements contained herein.	to maintain the ERC integrity.			
	22-Eng.	No operational or M-R-R	This ERC-related admin. cond. is required			
	Identif.	requirements contained herein.	to maintain the ERC integrity.			
PTO 8946-	3-Install	Construction/Installation already	APCD agrees; condition deleted as no			
01	Notificn.	accomplished	longer relevant to the federal permit.			
	12-	Condition is extraneous, since	Agreed: APCD will list this as 'APCD-only'			
	Equip.op	operating cond are specified	condition in Section 9.7.B			
	/ main.	elsewhere				
	13-Eng.	No operational or M-R-R	This NSR cond. in ATC 8946 is required for			
	Identif.	requirements contained herein.	compliance monitrg.; it is relevant.			
	14-Air	This is a CA Rule not federally-	This condition is deleted as no longer			
	Toxic	approved. Also, toxics not	relevant to operations at La Goleta Plant.			
	hot spot	covered under any APCD rules.	(Note: AB 2588 still applies to plant)			
	Reg.	No approximational or M.D.D.	Diamondo de didenti ed a condicione in dia			
	15-Com- pliance	No operational or M-R-R requirements contained herein.	Disagree; but identical condition in this permit in Section 9.7.A.(10). DELETED.			
	16-	No operational or M-R-R	Disagree; but identical condition in this			
	Sever-	requirements contained herein.	permit in Section 9.7.A.(5). DELETED.			
	ability	requirements contained herein.	permit in section 5.7.11.(3). DELETED.			
PTO 9075	5-Suppl.	This requirement is not based	This NSR condition in ATC 9075 is			
	srce- tstg	on any rules, APCD or federal.	required for compliance monitoring.			
	8-	Condition does not apply to the	APCD agrees; condition deleted as no			
	Monitrg.	permitted equipment	longer relevant to the federal permit.			
	12-	Condition is extraneous, since	Agreed: APCD will list this as 'APCD-only'			
	Equip.op	operating cond are specified	condition in Section 9.7.B			
	& main.	elsewhere				
	13-	No operational or M-R-R	This NSR cond. in ATC 9075 is required for			
	Engine	requirements contained in this	compliance monitrg.; it is relevant.			
	Identif.	provision.				
	14-Air	This Is a CA Rule not federally-	This condition is deleted as no longer			
	Toxic	approved. Also, toxics not	relevant to operations at La Goleta Plant.			
	hot spot	covered under any APCD rules.	(Note: AB 2588 still applies to plant)			
	Reg. 15-Com-	No operational or M-R-R	Disagree; but identical condition in this			
ĺ	pliance	requirements contained herein.	permit in Section 9.7.A.(10). DELETED.			
	16-	No operational or M-R-R	Disagree; but identical condition in this			
ĺ	Sever-	requirements contained herein.	permit in Section 9.7.A.(5). DELETED.			
ĺ	ability	1	r w seemen /// mm(e).			
PTO 9162	11-	Condition is extraneous, since	Agreed: APCD will list this as 'APCD-only'			
	Equip.op	operating cond are specified	condition in Section 9.7.B			
	& main.	elsewhere				
	12-	No operational or M-R-R	This NSR cond. in ATC 9162 is required for			
	Engine	requirements contained in this	compliance monitrg.; it is relevant.			
	Identif.	provision.				
	13-	No operational or M-R-R	This condition is deleted as no longer			
	Requir.	requirements contained in this	relevant to SoCalGas operation at La			
	of spare	provision for existing EUs.	Goleta Plant.			
	IC.					

Page 13 of 88 Pages

APCD PTO#	Cond. #	SoCalGas Listed Reason for Permit 'shield'	APCD Analysis of SoCalGas Information
110"	14-Air	This is a CA Rule not federally-	This condition is deleted as no longer
	Toxic	approved. Also, toxics not	relevant to operations at La Goleta Plant.
	hot spot	covered under any APCD rules.	(Note: AB 2588 still applies to plant)
	Reg	covered under any 711 CB rules.	(Note: 11B 2300 still applies to plant)
PTO 9275	2-Equip.	Condition is extraneous, since	Agreed: APCD will list this as 'APCD-only'
	oper. &	operating cond are specified	condition in Section 9.7.B
	main.	elsewhere	
	3-Com	No operational or M-R-R	Disagree; but identical condition in this
	pliance	requirements contained herein.	permit in Section 9.7.A.(10). DELETED.
	4-Sever-	No operational or M-R-R	Disagree; but identical condition in this
	ability	requirements contained herein.	permit in Section 9.7.A.(5). DELETED.
	7-Equip.	Condition is extraneous, since	Agreed: APCD will list this as 'APCD-only'
	oper. &	operating cond are specified	condition in Section 9.7.B
	main.	elsewhere	
	8-Com	No operational or M-R-R	Disagree; but identical condition in this
	pliance	requirements contained herein.	permit in Section 9.7.A.(10). DELETED.
	9-Sever-	No operational or M-R-R	Disagree; but identical condition in this
	ability	requirements contained herein.	permit in Section 9.7.A.(5). DELETED.
PTO 8166	1-	Condition not based on SIP	APCD agrees; this condition is deleted from
110 0100	thru'put	rules or NSR permit; not	the federal permit but retained inthe APCD -
	limits	federally enforceable.	only enforceable section.
	2-heat	Condition apply to boilers which	APCD agrees; the condition is deleted from
	input lim	are not addressed in this permit.	this permit and added elsewhere.
	3- Fuel S	Condition not based on SIP	Fuel S limit is used to prevent SO2 BACT
	limits	rules or NSR permit; not	triggering; the condition is deleted from this
	unus	federally enforceable.	permit and added elsewhere.
	4-Emiss.	Condition not based on SIP	APCD partially agrees. The limits placed in
	limitn.	rules or NSR permit; not	ATCs 9128 and 8335 (included later in
	umum.	federally enforceable.	8166) are retained; the others are deleted.
	5-	Condition not based on SIP	This condition is federally enforceable,
	Record-	rules or NSR permit; not	based on 40 CFR 70.6 (a)(3); this is a rule
	keeping	federally enforceable.	"gap-filling" condition.
	6-	Condition not based on SIP	This condition is federally enforceable,
	Annual	rules or NSR permit; not	based on 40 CFR 70.6 (a)(3); this is a rule
	report	federally enforceable.	"gap-filling" condition.
	7-Equip.	Condition is extraneous, since	Agreed: APCD will list this as 'APCD-only'
	7-Equip. operatio	operating cond are specified	condition in Section 9.7.B
	operano n	elsewhere	condition in Section 7.7.D
	8-Com	No operational or M-R-R	Disagree; but identical condition in this
		requirements contained herein.	
	pliance 0 Savar		permit in Section 9.7.A.(10). DELETED.
	9-Sever-	No operational or M-R-R requirements contained herein.	Disagree; but identical condition in this
DTO 9009	ability	-	permit in Section 9.7.A.(5). DELETED.
PTO 8008	6-Engine	No operational or M-R-R requirements contained in this	This condition is required for compliance
	Identif.	•	monitrg.; it is relevant.
		provision. This is a CA Rule not federally-	This condition is deleted as no longer
	O Aim	L TOUS IS A CACKINE HOLDEGERALLY-	This condition is deleted as no longer
	9-Air		nolowant to an augitions at I a Calata Di
	Toxic	approved. Also, toxics not	relevant to operations at La Goleta Plant.
	Toxic hot spot		relevant to operations at La Goleta Plant. (Note: AB 2588 still applies to plant)
	Toxic hot spot Reg.	approved. Also, toxics not covered under any APCD rules	(Note: AB 2588 still applies to plant)
	Toxic hot spot	approved. Also, toxics not	

APCD PTO#	Cond. #	SoCalGas Listed Reason for Permit 'shield'	APCD Analysis of SoCalGas Information
	11- Equip. oper. & main.	Condition is extraneous, since operating cond are specified elsewhere	Agreed: APCD will list this as 'APCD-only' condition in Section 9.7.B
	12- Sever- ability	No operational or M-R-R requirements contained herein.	Disagree; but identical condition in this permit in Section 9.7.A.(5). DELETED.
	13- Confl. of cond.	No operational or M-R-R requirements contained in this provision.	This admin. condition is relevant to compliance monitoring. (see also APCD SIP Rule 101)
PTO 6819	1- Thru'put limit	Condition not based on SIP rules or NSR permit; not federally enforceable.	The HC throughput limits control the HC emissions, thus cannot be deleted. <i>Deletion will also subject the facility toT3 orRule 370</i>
	3-Permit posting	No operational or M-R-R requirements contained in this provision.	This condition is required for compliance monitoring; it is relevant. (see also APCD SIP Rule 201)
	6-Equip. oper. & main.	Condition is extraneous, since no specific operating cond are specified.	Agreed: APCD will list this as 'APCD-only' condition in Section 9.7.B
	7- Maintain	Condition is extraneous, since no specific mainten. cond are specified.	Admin. cond.; stipulated in PTO 6819 to ensure permitted emissions.
	9-Renew.	Condition is extraneous, since no specific cond are specified.	Admin.cond.; stipulated in PTO 6819 for compliance monitorg. (see SIP Rule 203)
PTO 8335	5-Air Toxic hot spot Reg.	This is a CA Rule not federally-approved. Also, toxics not covered under any APCD rules.	This condition is deleted as no longer relevant to operations at La Goleta Plant. (Note: AB 2588 still applies to plant)
	6- Compli- ance	No operational or M-R-R requirements contained in this provision.	Disagree; but identical condition in this permit in Section 9.7.A.(10). DELETED.
	7-Equip. oper. & main.	Condition is extraneous, since no specific operating cond are specified.	Agreed: APCD will list this as 'APCD-only' condition in Section 9.7.B
	8-Sever- ability	No operational or M-R-R requirements contained in this provision.	Disagree; but identical condition in this permit in Section 9.7.A.(5). DELETED.

With the exception of permit conditions listed in Table 3.1 above and in Section 9.7.B, all permit conditions listed in this Part 70 permit are federally enforceable. However, SoCalGas must comply with all conditions that are enforceable by the State and the APCD.

Page 15 of 88 Pages

3.2 Compliance with Applicable Federal Rules

Federal regulation 40 CFR Part 70 (Operating Permits Program) requiring a federal operating permit is applicable to the La Goleta stationary source. However, based on permit application # 9584, none of the emission units listed in this permit are subject to 40 CFR: (a) 51/52 (NSR/PSD Review); (b) 60 (New Source Performance Standards); (c) 61 (National Emission Standards for Hazardous Air Pollutants) and (d) 63 (Maximum Available Control Technology).

3.3 Compliance with Applicable State Rules

No State of California air pollution control regulations listed in the California Health and Safety Code, Division 26, Part 4 (non-vehicular Air Pollution Control) and applicable to SoCalGas are federally enforceable; as such they are not applicable requirements, per APCD Rule 1301.

3.4 Compliance with Applicable APCD Rules

Table 3.2 below lists federally-enforceable APCD rules which apply to specified emission units at the La Goleta stationary source. The applicability of these rules is based on the permit application data submitted by SoCalGas and on the "Rules in Compliance" section of Reevaluation Analyses of the APCD PTOs: 6819, 7500, 8008, 8166, 8946, 9075, 9162 and 9275.

Table 3.2 Applicable APCD Prohibitory and Breakdown Rules

Generic Requirements	Affected Emission Units	Basis for Applicability		
APCD Rule 201, Permits Required	All emission units	Emission of pollutants		
APCD Rule 202, Exemptions to Rule 201	Units listed in Form 1302-H fuel/lube oil storage tanks, emergency diesel ICE	Equipment size/rating/function		
APCD Rule 203, Transfer of Ownership	All emission units	Change of ownership		
APCD Rule 206, Conditional Approval of PTOs	All emission units	Applicability of federal, state & APCD Rules		
APCD Rule 301, Circumvention	All emission units	Any pollutant emission		
APCD Rule 302, Visible Emissions	All emission units with plumes	Any visible plume emission		
APCD Rule 303, Nuisance	All emission units	Emissions that can injure, damage or offend.		
APCD Rule 305, Particulate Matter - Southern Zone	All PM emission units	Any particulate matter emission		

Page 16 of 88 Pages

Generic Requirements	Affected Emission Units	Basis for Applicability
APCD Rule 309, Specific Contaminants	All applicable PM/SQ /x/CO emission units	Any affected pollutant emission
APCD Rule 310, Odorous Organic Sulfides	Odorant Tanks, fugitive emissions from metering units	Potential emission of mercaptans
APCD Rule 311, Sulfur Content of Fuels	All combustion units	Use of field gas as fuel (sweetened to below 239 ppmvd as H2S).
APCD Rule 323, Architectural Coatings	Architectural Coatings used on Emission units	Application of architectural coatings
APCD Rule 505, Breakdown Conditions	All emission units	Procedure governing breakdowns where emission limits are exceeded
APCD Regulation XIII	All emission units	La Goleta is a major source.
Specific Requirements	Affected Emission Units	Basis for Applicability
APCD Rule 316, Storage and Transfer of Gasoline	Any gasoline storage & transfer equipment	Gasoline refueling operations at source.
APCD Rule 317, Organic Solvents	Paint & solvent use	Use of solvents emitting VOCs.
APCD Rule 322, Metal Surface Coating Thinner and Reducer	Metal Surface Coatings - used on Emission units	Application of metal surface coatings.
APCD Rule 324, Disposal and Evaporation of Solvents	Paints/coating operation; degreaser units	Use of photochemically reactive solvents.
APCD Rule 326, Storage of Reactive Organic Compound Liquids	Storage tanks for hydrocarbon liquids	7050 gallon tank used in storage of reactive organic liquids with vapor pressure > 0.5 psia.
APCD Rule 330, Surface Coating of Metal Parts and Products	Emission unit parts needing coating operation	Application of surface coatings to metal parts.
APCD Rule 333, Control of Emissions from Reciprocating Internal Combustion Engines	Gas compressor ICEs, cooling fan ICEs, power generator ICEs, air compressor ICEs, pump ICE, and fan ICE	Use of ICEs with rated brake horsepower of 50 or greater, unless exempted per APCD Rule 202

Page 17 of 88 Pages

Specific Requirements	Affected Emission Units	Basis for Applicability			
APCD Rule 342, Control of x from boilers, steam generators etc.	Boilers	Gas-fired boilers with heat input > 5 MMBtu/hr.			
APCD Rule 346, Loading of Reactive Organic Liquid Compounds	Loading Rack at HC liquid storage tank	Equipment used at storage tank for loading HC liquid into highway tanker trucks.			
APCD Rule 359, Flares and Thermal Oxidizers	All flare and thermal oxidizer units	Flare at a natural gas services source.			
APCD Rule 370, Potential to Emit Limitations for Part 70 Sources	Does not apply at this time				
APCD Rule 603, Emergency Episode Plan	Any stationary source with potential emissions greater than 100 tons/year	Emissions of VOC, NOx and CO exceed 100 tons/yr.			

In its Part 70 permit application 9584 Forms 1302-I1 and J-2, dated May 10, 1996, SoCalGas certified compliance with existing APCD permit conditions. That compliance plan becomes a part of this permit [see Permit Condition 9.7.A(3)(a){Compliance Plan}], and is included in the Appendix 1. SoCalGas also requested waiver from a number of permit conditions (refer to its 4/21/96 memorandum "Request for Permit Application Shield" attached with the Part 70 application # 9584); that request has been addressed in Section 3.1, Table 3.1.

4. ENGINEERING ANALYSIS

4.1 General

The engineering analyses in this permit are limited to:

- ⇒ Emission factors and calculation methods for the emission units
- ⇒ Emission control equipment
- ⇒ Source testing data

Detailed engineering analyses for this stationary source can be found in the Reevaluation Analysis Sections of APCD PTOs 6819, 7500, 8008, 8166, 8946, 9075, 9162 and 9275 (Appendix 1).

Page 18 of 88 Pages

SoCalGas: La Goleta Plant

4.2 Emission Analysis (if not shown in Appendix 1)

Spreadsheets based on AP-42, to compute HAP emissions from IC Engines, are shown below.

Page 19 of 88 Pages

Page 20 of 88 Pages

Page 21 of 88 Pages

4.3 Compliance Assurance Monitoring

La Goleta, a major source, may be subject to the USEPA's compliance assurance monitoring (CAM) rule (40 CFR 64) promulgated on October 1, 1997, when these rules become effective. This permit will be re-opened, revised and re-issued if it is deemed necessary to comply with the promulgated CAM rule provisions. Current monitoring requirements for this source do not include continuous in-stack monitoring.

4.4 Control Technology including Best Available Control Technology (BACT)

None of the emission units at this stationary source is subject to BACT requirements. However, all units must comply with any applicable technology, e.g., controls imposed by the APCD Rules and NSR permit conditions in the current APCD PTOs.

4.5 Source Testing/Sampling/Calibration Requirements

See "Source Test Requirements" tables in current APCD PTOs 8946, 9075 and 9162 and the "source test program" condition in the current APCD PTO 7500, attached in Appendix 1 of this permit. These also appear in Section 9 of this permit.

EMISSIONS

5.1 General

All current APCD PTOs for La Goleta stationary source were analyzed to determine the permitted emission limits of criteria pollutants from all applicable emission units. The permitted emissions for each emissions unit is based on the unit's physical and APCD rule-allowed potential to emit.

Consistent with the federal regulations 40 CFRs 51.166, 52.21 and 70.2, fugitive emissions of pollutants were excluded from the federal "potential to emit" computations for this stationary source. Also, based on the same federal mandates permit-exempt equipment emissions were included, to the extent they can be assessed, in the federal "potential to emit" — unless the equipment was listed in the USEPA's "trivial emissions unit" list (Reference: USEPA's White Paper I, dated July 10, 1995). Thus, this federal permit's "potential to emit" levels (PTE-70) are distinct and different from the APCD-indicated "potential to emit" levels (SSPTE); the latter being the same as combined nonfugitive and fugitive emissions from only the permitted equipment.

Page 22 of 88 Pages

5.2 Stationary Source Net Emissions Increase (SSNEI- 90)

This stationary source's net emissions increase since November 15, 1990 (the day the federal Clean Air Act Amendments was adopted in 1990) is listed in Table 5.2 titled "SSNEI-90." This information provides a historical background for any future modifications to the La Goleta stationary source.

5.3 Permitted Emission Limits - Emissions Units

The permitted emissions for each emission unit category is listed in Table 5.3 (this table merely sums up the permitted emission limits listed in all the Tables 1 of the current APCD PTOs incorporated in Appendix 1). These limits are based on the worst-case operating scenario for each emissions unit.

5.4 Permitted Emission Limits -- Facility/Stationary Source Total

The facility-wide permitted emission limits are also shown as a bottom line total in Table 5.3. Since La Goleta stationary source consists of a single facility, i.e., the La Goleta plant itself, the facility emissions total also represents the stationary source total emissions.

5.5 Exempt Emission Sources

Emissions from permit-exempt equipment count in the federal "potential to emit." See Table 5.4 for these emissions.

Page 23 of 88 Pages

SoCalGas: La Goleta Plant

5.6 Federal Potential to Emit for Source

All emissions which count in the federal "potential to emit" are listed in Table 5.5.

Page 24 of 88 Pages

Page 25 of 88 Pages

Page 26 of 88 Pages

Page 27 of 88 Pages

AIR QUALITY IMPACT ANALYSIS

This stationary source has not been subject to any air quality impact analysis requirements so far since its net emissions increases have not crossed the threshold levels of 80 lbs/day for PM10 and 120 lbs/day for all other pollutants (except CO for which the level is 550 lbs/day).

7. AQAP CONSISTENCY AND OFFSET REQUIREMENTS

7.1 General

La Goleta Stationary source is located in an ozone non-attainment area. Therefore, emissions from all emission units at the La Goleta source must be consistent with the provisions of the USEPA-approved air quality attainment plan (AQAP) and must not interfere with the attainment and maintenance of the federal air quality standards. Under APCD regulations, any modifications at the La Goleta source that result in an emissions increase of VOC and NOx exceeding 25 lbs/day must be accompanied by stringent control technology (LAER). Additional increases trigger a compensating emission reduction at the source or elsewhere so that there is a net air quality benefit for Santa Barbara County. These threshold levels are 55 lbs/day for all non-attainment pollutants except PM10 and CO for which the levels are 80 and 150 lbs/day.

La Goleta source has effected NOx emission reductions from the levels allowed by the APCD rules at seven of its internal combustion engine units. These are detailed in APCD PTO 7500. Credits for these reductions are being used by the Chevron Pt. Arguello project as offsets for its NOx emission increases at that source.

7.2 Air Quality Attainment Plan

Santa Barbara County does not meet the current hourly federal ambient ozone standard of 0.12 ppm. It will submit a modified 1997 Clean Air Plan soon to the USEPA through the State of California Air Resources Board. The plan, if approved by the USEPA, will be incorporated into the California State Implementation Plan (SIP). It indicates how the county will attain the ambient ozone standards by 2002 through the application of emission controls on mobile sources and, if required, on stationary sources including La Goleta.

7.3 Offset Requirements

See the APCD PTO 7500 in Appendix 1 of this permit for the emission reduction credits required to be maintained by the La Goleta source and used as offset by the Chevron Pt. Arguello project. The requirements associated with these emission reductions are also listed in Section 9.1.B (3) (Operation to Provide Offset ERCs) of this permit.

Page 28 of 88 Pages

7.4 ERC Source Verifications

The emission reduction credits offered by the La Goleta source are verified through quarterly recording and reporting of quantities of emissions captured. Annual source tests are the mechanisms for verifying the emission reduction credits achieved. Operational compliance to ensure ERCs is also verified through on-site inspections.

Page 29 of 88 Pages

SoCalGas: La Goleta Plant

8. LEAD AGENCY PERMIT CONSISTENCY

Not applicable to this Part 70 permit.

9. EMISSION UNITS AND RELATED PERMIT CONDITIONS

Section 9 lists applicable permit conditions for the La Goleta source. Each subsection in Section 9 lists conditions that apply to a particular emission unit (EU) category. For example, all tables and text in Section 9.1 pertain to IC engines. The generic and the specific permit conditions for IC engines are listed in separate subsections, namely, 9.1.A and 9.1.B. These two subsections are followed by monitoring, recordkeeping and reporting subsections. A similar format is followed for all EU categories

9.1 Conditions for Permitted Internal Combustion Engines At La Goleta Source

Table 9.1.1 Equipment List & Applicable Prohibitory/Breakdown Rules or NSR Conditions for IC Engines.

ID#	EQUIPMENT	Rule 301	Rule 302	Rule 303	Rule 305	Rule 309	Rule 311	Rule 331	Rule 333	Rule 505	BACT/ Offset	Other Req.
#2	650 hp gas compressor engine: Ingersoll Rand LVG-82, SN 8AL126	✓	✓	✓	√	√	√		√	✓	✓	APCD ATC # 7500
#3	650 hp gas compressor engine: Ingersoll Rand LVG-82, SN 8AL129	✓	√	√	>	√	✓		✓	√	>	# 7500
#4	650 hp gas compressor engine: Ingersoll Rand LVG-82, SN 8AL128	✓	✓	✓	✓	✓	✓		✓	√	✓	# 7500
#5	650 hp gas compressor engine: Ingersoll Rand LVG-82, SN 8AL127	✓	✓	✓	✓	✓	✓		✓	√	✓	# 7500
#6	660 hp gas compressor engine: Ingersoll Rand KVG-62, SN 6EL265	✓	√	✓	✓	✓	✓		✓	✓	√	# 7500
#7	660 hp gas compressor engine: Ingersoll Rand KVG-62, SN 6EL266	√	✓	✓	✓	✓	√		✓	✓	✓	APCD ATC # 7500
#8	660 hp gas compressor engine: Ingersoll Rand KVG-62, SN 6EL 267	✓	√	✓	✓	✓	✓		✓	√	√	APCD ATC # 7500
#9	1100 hp gas compressor engine: Cooper Bessemer GMV-10C	✓	✓	✓	✓	✓	✓		✓	√	√	APCD ATC # 9075
#16A	48 hp cooling fan engine: Waukesha VRG220U	✓	✓	✓	✓	✓	✓		✓	✓		APCD ATC # 8946
#15A	48 hp cooling fan engine: Waukesha VRG220U	√	√	✓	√	✓	✓			✓		APCD ATC # 8946
#17A	48 hp cooling fan engine: Waukesha VRG220U	√	√	√	√	√	√			✓		APCD ATC # 8946
#18A	48 hp cooling fan engine: Waukesha VRG220U	√	√	✓	√	√	√			√		APCD ATC # 8946

Page 30 of 88 Pages

Table 9.1.1 Equipment List & Applicable Prohibitory/Breakdown Rules & NSR Conditions for IC Engines(Cont)

ID#	EQUIPMENT	Rule 301	Rule 302	Rule 303	Rule 305	Rule 309	Rule 311	Rule 331	Rule 333	Rule 505	BACT/ Offset	Other Req.
#1A	170 hp electrical generator:		√				<u> </u>	331			Oliset	APCD
" 17	Waukesha 6-WAK-79A	\checkmark	✓	✓	✓	✓	✓		✓	 		ATC#
	Waddesha o Will Fort											9162
#2A	170 hp electrical generator:	1	./	./	./	√	√		./	1		APCD
, `	Waukesha 6-WAK-79A	•	V	•	•	•			V	•		ATC#
												9162
#3A	170 hp electrical generator:	√	1	_	√	1	✓		1	✓		APCD
	Waukesha 6-WAK-79A	•	_	_	_					•		ATC #
												9162
#20A	144 hp electrical generator:	√	√	✓	✓	✓	✓		✓	✓		APCD
	Waukesha 145 GZU	•		•	•	•						ATC #
												9162
#6A	74 hp cooling fan engine:	\checkmark	√	✓	✓	✓	✓		✓	✓		APCD
	Waukesha VRG330U											ATC #
												9162
#7A	74 hp cooling fan engine:	\checkmark	\checkmark	✓	✓	✓	\checkmark		\checkmark	✓		APCD
	Waukesha VRG330U											ATC#
							.					9162
#8A	74 hp cooling fan engine:	\checkmark	\checkmark	\checkmark	\checkmark	✓	✓		✓	✓		APCD
	Waukesha VRG330U											ATC#
#O.A	74 by spaling for against											9162
#9A	74 hp cooling fan engine: Waukesha VRG330U	\checkmark	✓	✓	✓	✓	✓		✓	✓		APCD ATC#
	Waukesiia VRG3300											9162
#10A	74 hp cooling fan engine:											APCD
#TUA	Waukesha VRG330U	✓	✓	✓	✓	✓	✓		✓	✓		ATC#
	Wadkesha VICOSOO											9162
#11A	74 hp cooling fan engine:	√	√	√	√	√	1			✓		APCD
,,,,,,	Waukesha VRG330U	V	V	V	V	V	•		•	•		ATC#
	Traditional Tribodo											9162
#4A	48 hp air compressor	√	./	./	./	./	1			_/		
	engine: Waukesha	•	•	_	_	•	•			•		
	VRG220U											
#5A	48 hp air compressor	√	√	√	1	1	✓			✓		
	engine: Waukesha	_	•	•	•	•				•		
	VRG220U											
#19A	24 hp cooling fan engine:	√	/	/	√	√	√			✓		
	Waukesha VRG155U											
#14A	54 hp well water pump	✓	✓	✓	✓	✓	✓		✓	✓		
	engine: Waukesha 6BZ-2C											

Page 31 of 88 Pages

Table 9.1.2 Applicable generic emission limits & standards for IC engines — Summary

Applicable Requirement	Permit Cond. #9.1.A	Pollutant/Parameter	Limits/Standards ¹	Monitoring Method	MTRG ² Cond. § 9.1.
APCD Rule 301	(1)	All pollutants	No circumvention of any mass concentration limits through effluent stream dilution	Annual APCD Source Inspection	Comply w/other cond. in PTO
APCD Rule 302.B	(3)(a)	PM/Visible Emissions	20% opacity, not to be exceeded over 3 minutes in any one hour	Human Observer Annual APCD Source Inspection	A.(3)
APCD Rule 303	(2)	Air Contaminants	No nuisance: also, no endangering of health, safety comfort; nor cause damage to any property/business	Maintaining a complaint log onsite.	A.(2)
APCD Rule 305	(3)(b)	PM	0.19 0.20 gr./dscf	choice of fuel use	A.(3)(b)
APCD Rule 309.A.1	(4)(a)	SO2	2,000 ppmv	Fuel S content	A.(4)(a)
APCD Rule 309.A.2	(3)(b)	PM	0.1 gr./dscf @ 12% CO2	choice of fuel use	A.(4)(a)
APCD Rule 311.B	(4)(b)	SO2	15 gr. as H2S/100 cu.ft of gaseous fuel	Fuel S Content	A.(4)(a)

Table Note 1 -- Requirement summarized; refer to APCD Rule § listed in Column 1 for full text; 2 -- 'MTRG' stands for Monitoring.

9.1.A. Generic Emission/Operation Limits For IC Engines [Reference: 40 CFR 70.6(a)(1)]

- (1) **Circumvention** No emissions shall be concealed using diluent air or without any actual required pollution reductions [*Reference: APCD Rule 301*].
- (2) **Nuisance** No pollutant emissions from any IC engine shall create nuisance conditions off-site [*Reference: APCD Rule 303*]; complaint logs shall be maintained on-site to record any nuisance complaint reported to the APCD which requires SoCalGas mitigation action. APCD's Regulatory Compliance Manual, Section IV, lists nuisance enforcement measures.
- (3) **Particulate Emissions** Particulate emissions from any IC engine shall not exceed the following limits:
 - (a) **Opacity**: A plume opacity, as dark or darker in shade or obscuring an observer's view to a degree equal to or greater than smoke designated as No. 1 on the Ringelmann Chart (as published by the US Bureau of Mines), for a period or periods aggregating more than three minutes in any one hour [*Reference: APCD Rule 302.B*]; compliance with this condition is automatically met as long as: (i) the IC engines are fired with natural gas (uncontrolled PM₁₀ emission factor equivalent to 0.007 gr./dscf); and, (ii) the engines and their control devices (if any) are performing their normal, designed functions and are being operated according to standard procedures [per condition 9.1.B.(2)(a)(2)]
 - (b) **Mass Emission Rate**: 0.1 grains per dry standard cubic foot, corrected to 12% CO2 at standard conditions of 60°F and 29.92 inches of mercury [*Reference: APCD Rule 309.A.2.b*]; compliance with this condition is automatically met as long as the IC engines are fired with natural gas (uncontrolled PM₁₀ emission factor equivalent to 0.007 gr./dscf).
- (4) **SO**₂ **Emissions** SO₂ emissions from any IC engine shall not exceed the following limits:
 - (a) **SO2 ppmv:** 2,000 ppmv concentration of sulfur compounds, calculated as SO2, at the point of discharge into ambient atmosphere [*Reference: APCD Rule 309.A.1*]; compliance with this condition is automatically met as long as the IC engines are fired with natural gas with permit-stipulated limits [i.e., containing less than 12 ppmv of H₂S <u>PUC quality natural gas</u>].

Page 32 of 88 Pages

(b) **H2S ppmv:** The gaseous fuel shall not contain sulfur compounds in excess of 15 gr./100 cubic feet (or, 238 ppmv), calculated as H₂S at standard conditions [*Reference: APCD Rule 311.B*]; compliance with this condition is automatically met as long as the IC engines are fired with natural gas with permit-stipulated limits [i.e., containing less than 12 ppmv of H₂S PUC quality natural gas].

Page 33 of 88 Pages

Table 9.1.3 Applicable Unit-Specific Emission Limits/Standards for IC Engines —Summary

IC Eng. ID#	Applicable Requirement	Permit	Limit/Standard ¹	Monitoring Method	MTRG ²					
1	- , , , , , , , , , , , , , , , , , , ,	Cond. #		g	cond. #					
		9.1.B			9.1.C					
Pollutant: NOx										
ID #'s	APCD Rule 333 D.1.a &	(1).(a)	50 ppmv @15% O2 or 90%	Annual source tests and	(1).(a)(b)					
2 - 8	D.1.b & PTO 7500		reduction effy. for the NOx control	quarterly NOx monitoring	(2).(a)(b)					
	DTO 7500 Table 4	(4) (-)	device	A	(4) (-)(1-)					
	PTO 7500 - Table 1	(1).(a)	2.37 lbs/hr, 56.88 lbs/day and 9.05 tons/yr for each engine	Annual source testing and fuel use	(1).(a)(b) (2).(a)(b)					
ID #9	APCD Rule 333 D.2.a	(1).(b)	125 ppmv @15% O2	Biennial source tests &	(2).(a)(b) (1).(a)(c)					
ID #9	PTO 9075	(1).(0)	123 ppinv @ 13 % O2	monitoring per I&M plan	(1).(a)(c) (2).(a)(c)					
	PTO 9075 - Table 2	(1).(b)	4.56 lbs/hr, 109.44 lbs/day and	Biennial source testing	(1).(a)(c)					
		(1)-(2)	19.97 tons/yr.	g	(2).(a)(c)					
ID #'s 1A -	APCD Rule 333 D.1.a &	(1).(c)	50 ppmv @ 15% O2	Biennial source test and	(2).(a)(c)					
3A & 20A	PTO 9162: Table 3			monitoring per I&M plan						
	PTO 9162 Table 2	(1).(c)	0.34 lb/hr & 1.51 tons/yr. for 1A-	Biennial source testing	(2).(a)(c)					
			3A; 0.3 lb/hr, .72 lb/day, 1.3 ton/yr							
ID #= 0A	ADOD D 1- 000 D 1 - 0	(4) (-)	for 20A	Discript constant and	(0) (-)(-)					
ID #s 6A - 11A	APCD Rule 333 D.1.a & PTO 9162: Table 3	(1).(c)	50 ppmv @ 15% O2	Biennial source test and	(2).(a)(c)					
IIA	PTO 9162. Table 3	(1).(c)	0.14 lb/hr & 0.6 ton/yr for each unit	monitoring per I&M plan Biennial source testing	(2).(a)(c)					
ID #s 15A-	APCD Rule 333 D.1.a &	(1).(d)	50 ppmv @ 15% O2	Biennial source test and	(2).(a)(c)					
18A	PTO 8946: Table 3	(1).(a)	30 pp/// @ 13/8 G2	monitoring per I&M plan	(Z).(a)(c)					
	PTO 8946 - Table 2	(1).(d)	.09 lb/hr & 0.4 ton/yr for 16A;.96	Biennial source testing	(2).(a)(c)					
			lb/hr,23.04 lbs/day & 4.19 tons/yr	3	also, 1(d)					
			each for the rest		for 16A					
ID #s 4A, 5A	APCD Rule 333 D.1.a	(1).(e)	50 ppmv @ 15% O2	Biennial source test and	(2).(a)(d)					
		4.5.4.5		monitoring per I&M plan	(-) () ()					
	PTO 8008 - Table 2	(1).(e)	0.87 lbs/hr & 3.80 tons/yr.	Biennial source testing	(2).(a)(d)					
ID # 19A	APCD Rule 333 D.1.a	(1).(e)	50 ppmv @ 15% O2	Biennial source test and	(2).(a)(d)					
	PTO 8008 - Table 2	(1).(e)	0.42 lbs/hr & 1.82 tons/yr.	monitoring per I&M plan Biennial source testing	(2).(a)(d)					
ID # 14A	PTO 8008 - Table 2	(1).(e) (1).(e)	1.29 lbs/hr & 0.13 tons/yr.	Biennial source testing	(2).(a)(d) (2).(a)(d)					
10 # 14/	1 10 0000 - Table 2		Pollutant : VOC (ROC)	Dienniai source testing	(2).(a)(u)					
ID #'s	APCD Rule 333 D.1.a	(1).(f)	250 ppmv @ 15% O2	Annual source tests	(1).(a)(b)					
2 - 8	7.1. OD 11.0.0 000 D.1.0	(') · (')	200 ppiniv @ 1070 02	, anidal source tests	(1).(a)(b) (2).(a)(b)					
	PTO 7500 - Table 1		2.34 lbs/hr and 8.94 tons/yr for	Annual source testing and	(1).(a)(b)					
			each engine	fuel use	(2).(a)(b)					
ID #9	APCD Rule 333 D.2.a	(1).(f)	750 ppmv @ 15% O2	Biennial source test and	(1).(a)(c)					
				monitoring per I&M plan	(2).(a)(c)					
ID # 9	PTO 9075 - Table 2		24.80 lbs/hr & 108.65 tons/yr.	Biennial source testing	(1).(a)(c)					
ID #1.44	ADOD D. L. COO D. L. C	(4) (6)	050 0 450/ 00	Discription of the control of the co	(2).(a)(c)					
ID #'s 1A -	APCD Rule 333 D.1.a &	(1).(f)	250 ppmv @ 15% O2	Biennial source test and	(2).(a)(c)					
3A & 20A ID #'s 1A -	PTO 9162: Table 3 PTO 9162 Table 2		1 56 lbg/br 2 0 90 topo/urfor 1 A	monitoring per I&M plan	(2) (0)(6)					
3A & 20A	F10 9162 Table 2		1.56 lbs/hr & 0.80 tons/yr for 1A- 3A; 1.34 lbs/hr & 5.88 tons/yr-20A	Biennial source testing	(2).(a)(c)					
	Danis de la constant	4000 D. /- C	listed in Column 2 for text: 2 'MTRG							

Table Note 1 -- Requirement summarized;see APCD Rule § listed in Column 2 for text; 2 -- 'MTRG' stands for Monitrg.

Page 34 of 88 Pages

Table 9.1.3 Applicable Unit-Specific Emission Limits/Standards for IC Engines —Summary

IC Eng. ID #	Applicable Requirement	Permit	Limit/Standard ¹	Monitoring Method	MTRG ²
io Eng. io #	Applicable Requirement	Cond. # 9.1.B	Limbotandara	monitoring method	cond. # 9.1.C
ID #s 6A - 11A	APCD Rule 333 D.1.a & PTO 9162: Table 3	(1).(f)	250 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(c)
	PTO 9162 Table 2		0.62 lb/hr, 14.88 lbs/day & 2.72 tons/yr. for each unit	Biennial source testing	(2).(a)(c)
ID #s 15A- 18A	PTO 8946: Table 3		(2).(a)(c)		
	PTO 8946 Table 2		.42 lb/hr,10.08 lbs/day & 1.83 tpy for 16A; .14 lb/hr, 3.36 lbs /day & .63 tpy each for the rest	Biennial source testing	(2).(a)(c) also, 1(d) for 16A
ID #s 4A, 5A	APCD Rule 333 D.1.a	(1).(f)	250 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(d)
	PTO 8008 - Table 2		.13 lb/hr,3.12 lbs/day &.57 tpy	Biennial source testing	(2).(a)(d)
ID # 19A	APCD Rule 333 D.1.a	(1).(f)	250 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(d)
	PTO 8008 - Table 2		.06 lb/hr,1.44 lbs/day &.27 tpy	Biennial source testing	(2).(a)(d)
ID # 14A	PTO 8008 - Table 2	(1).(f)	.19 lb/hr,4.56 lbs/day &.02 tpy	Biennial source testing	(2).(a)(d)
			Pollutant: CO		
ID #'s 2 - 8	APCD Rule 333 D.1.a	(1).(g)	4,500 ppmv @ 15% O2	Annual source tests	(1).(a)(b) (2).(a)(b)
	PTO 7500 - Table 1		27.81 lbs/hr, 667.44 lbs/day & 106.45 tons/yr for each engine	Annual source testing and fuel use	(1).(a)(b) (2).(a)(b)
ID #9	APCD Rule 333 D.2.a	(1).(f)	4,500 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(1).(a)(c) (2).(a)(c)
	PTO 9075 - Table 2		99.93 lbs/hr, 1.20 tons/day and 437.69 tons/yr.	Biennial source testing	(1).(a)(c) (2).(a)(c)
ID #'s 1A - 3A & 20A	APCD Rule 333 D.1.a & PTO 9162: Table 3	(1).(f)	4500 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(c)
	PTO 9162 Table 2		18.83 lbs/hr, 451.92 lbs/day & 82.49 tons/yr for 1A-3A; 16.29 lbs/hr, 390.96 lbs/day & 71.34 tons/yr for 20A	Biennial source testing	(2).(a)(c)
ID #s 6A - 11A	APCD Rule 333 D.1.a & PTO 9162: Table 3	(1).(f)	4500 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(c)
ID #s 6A - 11A	PTO 9162 Table 2		7.54 lbs/hr, 180.96 lbs/day & 33.04 tons/yr for each unit	Biennial source testing	(2).(a)(c)
ID #s 15A- 18A	APCD Rule 333 D.1.a & PTO 8946: Table 3	(1).(f)	4500 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(c)
	PTO 8946 Table 2		5.05 lbs/hr, 121.20 lbs/day & 22.13 tons/yr for 16A; .21 lb/hr 5.04 lbs/day & 0.90 ton/yr for each of the rest	Biennial source testing	(2).(a)(c), (1)(d) for 16A
ID #s 4A, 5A	APCD Rule 333 D.1.a	(1).(f)	4,500 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(d)
	PTO 8008 - Table 2	ADOD D 4: 0	0.19 lb/hr, 4.56 lbs/day & 0.82 ton/yr.	Biennial source testing	(2).(a)(d)

Table Note 1 -- Requirement summarized; see APCD Rule § listed in Column 2 for text; 2--'MTRG' stands for Monitoring

Page 35 of 88 Pages

Table 9.1.3 Applicable Unit-Specific Emission Limits/Standards for IC Engines - Summary.

Table 9.1.3 Applicable Unit-Specific Emission Limits/Standards for IC Engines - Summary.								
IC Eng. ID#	Applicable Requirement	Permit Cond. # 9.1.B	Limit/Standard ¹	Monitoring Method	MTRG ² cond. # 9.1.C			
ID # 19A	APCD Rule 333 D.1.a	(1).(f)	4,500 ppmv @ 15% O2	Biennial source test and monitoring per I&M plan	(2).(a)(d)			
	PTO 8008 - Table 2		0.09 lb/hr, 2.16 lbs/day & 0.39 Biennial source testing ton/yr.		(2).(a)(d)			
ID # 14A	PTO 8008 - Table 2	(1).(f)	0.28 lbs/hr, 25.92 lbs/day & 0.03 ton/yr.	Biennial source testing	(2).(a)(d)			
			Pollutant: SO2					
ID #'s 2 - 8	PTO 7500 - Table 1	(1)	0.09 lb/hr, 2.16 lbs/day and 0.36 ton/yr for each engine	Fuel S content and annual fuel use	(2).(a)(b)(c)(d)			
ID #9	PTO 7500 <u>9075</u> - Table 2	(1)	0.02 lb/hr and 0.08 ton/yr.	Fuel S content and annual fuel use	(2).(a)(b)(c)(e)			
ID #'s 1A - 3A & 20A	PTO 9162 Table 2	(1)	0.02 ton/yr. for 1A-3A & 0.01 ton/yr. for 20A	Fuel S content & annual fuel use	(2).(a)(c)			
ID #s 6A - 11A	PTO 9162 Table 2	(1)	0.01 ton/yr. for each unit	Fuel S content & annual fuel use	(2).(a)(c)			
ID #s 15A- 18A	PTO 8946 - condition	(1)	0.76 gr. of S (as H2S)/100 scf of fuel gas	none	(2).(a)(c)			
	PTO 8946 Table 2	(1)	0.004 ton/yr. for each unit	Fuel S content & annual fuel use	(2).(a)(c)			
ID #'s 4A, 5A	PTO 8008 - Table 2	(1)	0.01 lb/hr, 0.24 lb/day & 0.03 ton/yr.	Fuel S content & annual fuel use	(2).(a)(d)			
ID # 19A	PTO 8008 - Table 2	(1)	0.004 lb/hr, 0.096 lb/day & 0.004 tons/yr.	Fuel S content & annual fuel use	(2).(a)(d)			
ID # 14A	PTO 8008 - Table 2	(1)	0.01 lbs/hr, 0.24 lb/day & 0.004 tons/yr.	Fuel S content & annual fuel use	(2).(a)(d)			
			Pollutant: PM10					
ID #'s 2 - 8	PTO 7500 - Table 1	(1)	0.07 lb/hr, 1.68 lbs/day & 0.27 ton/yr. for each engine	None	None			
ID #9	PTO 9075 - Table 2	(1)	0.46 lb/hr, 11.04 lbs/day & 2.00 tons/yr.	None	None			
ID #'s 1A - 3A & 20A	PTO 9162 - Table 2	(1)	.02 lb/hr, .48 lb/day & .07 ton /yr. for 1A-3A; .01 lb/hr, .24 lb/day & .06 ton/yr. for 20A	None	None			
ID #s 6A - 11A	PTO 9162 - Table 2	(1)	0.01lb/hr, 0.24 lb/day & 0.03 ton/yr. for each unit	None	None			
ID #s 15A- 18A	PTO 8946 - Table 2	(1)	0.004lb/hr,0.096 lb/day & 0.02 ton/yr. for each unit	None	None			
ID #'s 4A, 5A	PTO 8008 - Table 2	(1)	0.004 lb/hr,0.096 lb/day & 0.02 tons/yr.	None	None			
ID # 19A	PTO 8008 - Table 2	(1)	0.004 lb/hr,0.096 lb/day & 0.01 tons/yr.	None	None			
ID # 14A	PTO 8008 - Table 2	(1)	0.01 lb/hr, 0.24 lb/day & 0.004 ton/yr.	None	None			

Table Note 1 -- Requirement summarized; refer to APCD Rule § listed in Column 2 for full text; 2 -- 'MTRG' stands for Monitoring

Page 36 of 88 Pages

9.1.B. Unit-Specific Emissions/Operations Limitation. [Reference: 40 CFR 70.6(a)(1)]

- (1) Emission Limits Specific pollutant emissions from each IC Engine unit listed in this permit section shall not exceed the emission limits specified for it in Table 9.1.3, unless an USEPA-approvable exemption to do so is obtained under Rule 505 listed in Table 9.1.1. Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit. The limits in Table 9.1.3 do not supersede any other limits that may be specified for the equipment by any applicable requirement promulgated by the USEPA or the APCD during the life of this permit.
- (a) IC Engines With ID #'S 2 8: The performance standards of each NOx emission control device shall be maintained (a) within the most current maximum and minimum setpoint settings which have demonstrated compliance through emissions source testing as described in this permit, and (b) at either 90 percent or greater efficiency or an outlet concentration of 50 ppmv or less at 15% O2. Control efficiency shall be determined by using ppmv NOx values corrected to 15% O2 taken from the inlet and the outlet to the catalytic converter.

 [Reference: SoCalGas PTO 7500]
 - (b) **IC Engines With ID #9**: Emissions from the equipment shall not exceed the limits shown in Table 9.1.3. Compliance with this condition will be assessed through exhaust emission source testing and the ICE Inspection and Maintenance Plan. [*Reference: SoCalGas ATC 9075*]
 - (c) **IC Engines With ID #'S 1A -3A, 6A 11A, and 20A**: Emissions from these equipment shall not exceed the limits shown in Table 9.1.3. Compliance with this condition will be assessed through compliance with the operational limitations and other unit-specific conditions of this permit. [Reference: SoCalGas ATC 9162]
 - (d) **IC Engines With ID #'S 15A 18A**: Emissions from these equipment shall not exceed the limits shown in Table 9.1.3. Compliance with this condition will be assessed through exhaust emission source testing for Unit # 16A and the ICE Inspection and Maintenance Plan). [*Reference:* SoCalGas ATC 8946]
 - (e) **IC Engines With ID #'S 4A, 5A, 14A AND 19A**: Emissions of air contaminants resulting from the operation of these equipment shall not exceed the values listed in Table 9.1.3. These emission limits are based upon data as provided in the original application(s) for the APCD PTO # 8008. Compliance with this condition will be assessed through compliance with other unit-specific conditions of this permit. [*Reference: SoCalGas PTO 8008*]
- (2) **Operational Limits** The operational limitations listed below shall apply to the IC engines listed in this permit section. Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit.
 - (a) All IC Engines:

Fuel Type Use — Only **natural gas fuel** shall be used in the IC engines listed in this permit. [*Reference: SoCalGas ATCs 9075, 9162,8946 & PTOs 7500 & 8008*]

(2). **Equipment Operation And Maintenance** — Operation under this permit shall be conducted in compliance with all data, specifications, references and assumptions included with the Part 70 permit applications and supplements thereof (a copy to be made available to any person requesting it), and the attached APCD Engineering Evaluation under which this permit is issued. [*Reference: APCD 206*]

Page 37 of 88 Pages

SoCalGas: La Goleta Plant

(b) IC Engines With ID #'S 2-9, 1A-3A, 6A-11A, 15A-18A, 20A:

- (1). **Engine Identification** Each internal combustion engine shall have an identification plate or tag permanently affixed listing the make, model and serial number (or the operator's tag number). During any inspection, all identification plates or tags shall be made accessible and legible to facilitate APCD inspection of the engine. [*Reference: SoCalGas APCD PTOs all*]
- (2). **IC Engine Routine Replacements** As a matter of routine replacement, any of the IC engines may be replaced with an identical make and model IC engine, provided it is set up and configured in the same manner as described by this permit. [*Reference: APCD Rule 202.D.9*]
- (3). Inspection And Maintenance Plan (I&M Plan) The permittee shall operate in accordance with the APCD-approved, Rule 333.E required IC engine Inspection and Maintenance Plans. For IC engines 1A 3A, 20A, and 6A 11A, the approved plan was submitted on May 6, 1994. For IC engines 15A 18A, the approved plan was submitted on June 18, 1993. For IC engine 9, the approved plan was submitted on August 26, 1994. All required logs of the parameter settings and values documented by this plan shall be compiled and made readily available on-site for review by he APCD Inspection staff upon request. This plan may only be revised upon written APCD approval. Any plan modification must be submitted to the APCD for its review and approval prior to implementation. [Reference: APCD Rule 333.E]
- (c) IC Engines With ID #'S 2 8: [Reference: SoCalGas PTO 7500]
- (1). **Monitoring Of Engine Operation** Each engine shall be equipped with an hour meter. [*Reference:* SoCalGas PTO 7500]
- (2). **Engine Exhaust** All engine exhaust shall pass through the catalyst bed of the catalytic converter prior to being emitted into the atmosphere, except during periods of start-up and shutdown. A start-up or shutdown period may not exceed 15 minutes. [*Reference: SoCalGas PTO 7500*]
- (3). **Air-Fuel Ratio Controllers** Each Air-Fuel Ratio Controller (AFRC) shall be operated, calibrated, and maintained at all times in accordance with the AFRC Compliance Plan. [*Reference:* SoCalGas PTO 7500]
- (4). **Oxygen Sensors** Oxygen sensors in the stack shall be replaced by SoCalGas at least every 2,000 hours of engine operating time or sooner as described in its IC Engine Compliance Plan. The date of each replacement shall be recorded in the maintenance log and quarterly reports, and this data shall be made available to the APCD inspector upon request. [*Reference: SoCalGas PTO 7500*]
- (5). **IC Engine Compliance Plan** SoCalGas will implement the APCD-approved IC Engine Compliance Plan dated May 1997 (and subsequent revisions) which addresses the procedures that will be followed to establish and maintain proper operation and maintenance of the AFRC system. This plan shall be updated yearly to reflect any new operational or maintenance procedures. The APCD may require updates to the plan if conditions warrant change. The Plan shall include the following areas: [*Reference: SoCalGas PTO 7500*]
- a. Oxygen sensor operation and maintenance procedures;
- b. A copy of the manufacturer's AFRC recommended operational & maintenance procedures and specifications;
- c. AFRC calibration schedule and procedures; and,
- d. Procedures to ensure that the AFRC and catalyst are operating in compliance with all provisions of this permit, APCD Rules and Regulations, and the APCD- approved offset lease between SoCalGas and Chevron USA, INC., for the Point Arguello Project (APCD PTO 5704).

Page 38 of 88 Pages

These procedures shall include an ongoing process of confirming proper AFRC and catalyst operation.

The AFRC Compliance plan is hereby incorporated by reference in this permit.

- (6). **Engine Operation** SoCalGas shall operate each engine within the most current maximum and minimum setpoint settings which have demonstrated compliance through emissions source testing as described in this permit. Any continuous operations out of the sensor voltage range determined by these source tests shall constitute a violation of this permit. For purposes of this permit, continuous operations are defined as 15 minutes of uninterrupted operation. [Reference: SoCalGas PTO 7500]
- (7). **Maintenance Of Engines** Each engine shall be maintained in conformance with the designed operations and maintenance procedures necessary to minimize the pollutant emissions from the engine. A copy of these procedures shall be made available to the APCD upon request. For each engine, records shall be kept to document the maintenance activities along with any adjustment to the operations and maintenance procedures which may change the emissions. These maintenance and adjustment records shall be submitted to the APCD upon request. [Reference: SoCalGas PTO 7500]
- (8) **Reimbursement Of Costs** All costs reasonably incurred by the APCD, including APCD consultants and legal counsel (but not attorney's fees in litigation) related to this permit and implementation and enforcement of these permit conditions shall be reimbursed by SoCalGas within 30 calendar days of invoicing by the APCD. [*Reference: SoCalGas PTO 7500*]
- (d) IC Engines With ID #'S 1A 3A, 20A, 6A 11A: [Reference: SoCalGas ATC 9162]
- (1). **Heat Input** Maximum hourly and annual heat input (MMBtu/hr) to the IC engines 1A 3A, 20A and 6A 11A listed in this permit are limited to the values shown below:

ICE ID#	Max. Hourly Heat Input	Max. Annual Heat Input
	(each engine, MMBtu/hr)	(Each engine, MMBtu/yr.)
1A — 3A	1.87	16,381
20A	1.62	14,167
6A — 11A	0.75	6,560

- (2). NSCR Catalyst Use IC engine 1A 3A, 20A and 6A 11A listed in this permit shall be equipped with NSCR catalyst to reduce exhaust emissions of NOx, ROC and CO.
- (3) **Replacement Engine Operations** If any IC engine is replaced, SoCalGas shall perform the following inspections on the new replacement engine within fourteen (14) calendar days of its start of operation:
- a. Perform any and all IC engine parameter setups, adjustments, or measurements
 which may be documented in the APCD-approved IC engine Inspection & Maintenance
 Plan (I&M Plan) applicable to the replaced IC engine; and,
- b. Measure and record the IC engine's actual exhaust oxygen, oxides of nitrogen (NOx), and carbon monoxide (CO) concentrations in ppmv, dry basis, corrected to 15% oxygen.
 Verify that NOx and CO concentrations comply with applicable APCD Rule limits.
- (e) IC Engines With ID #'S 15A 18A: [Reference: SoCalGas ATC 8946]

Heat Input — Maximum hourly and annual heat input (MMBtu/hr) to the IC engines 15A — 18A listed in this permit are limited to the values shown below:

Page 39 of 88 Pages

SoCalGas: La Goleta Plant

ICE ID #Max. Hourly Heat Input
(each engine, MMBtu/hr)Max. Annual Heat Input
(each engine, MMBtu/yr.)

Santa Barbara County APCD FINAL Part 70 Permit 9584 - 01 Permit Expires on 1/12/03 15A — 18A 0.50 4,394

(f) IC Engines With ID #'S 4A, 5A, 19A & 14A: [Reference: SoCalGas PTO 8008]

(1). HEAT INPUT — Maximum hourly and annual heat input (MMBtu/hr) to the IC engines 4A, 5A, 19A and 14A listed in this permit are limited to the values shown below:

ICE ID#	Max. Hourly Heat Input	Max. Annual Heat Input
	(MMBtu/hr)	(MMBtu/yr.)
4A	0.46	3,995
5A	0.46	3,995
19A	0.22	1,913
14A	0.68	135

- (2). **Limited Hours Of Operation** IC engine 14A listed in this permit shall operate less than two hundred (200) hours per calendar year.
- (3). **Engine Hour Monitoring** IC engine 14A listed in this permit shall be equipped with an hour meter which is: either (1) non-resettable or (2) if resettable, equipped with a logbook recording the date and hour meter time reading each time the meter is reset. [Reference: APCD Rule 333.H.1.b)]
- (g) IC Engine With ID # 9: [Reference: SoCalGas ATC 9075]

Heat Input — Maximum hourly and annual heat input (MMBtu/hr) to the IC engine 9 listed in this permit are limited to the values shown below:

ICE ID#	Max. Hourly Heat Input	Max. Annual Heat Input
	(MMBtu/hr)	(MMBtu/yr.)
9	9.92	86,917

(3) **Operation to Provide Offset ERCs** — The following operating stipulation, applicable to engines 2 - 8, shall be met by the permittee to ensure appropriate Emission Reduction Credits to Chevron, USA for its Point Arguello Project:

Replacement Reporting: SoCalGas shall inform the APCD via telephone within 24 hours and in writing within five working days of any replacement of SoCalGas-operated engines 2 - 8 or their associated control equipment. Such replacement is only allowed in accordance with the APCD Rules and Regulations. If an engine or catalyst is replaced for these equipment (i.e., 2 - 8), source testing shall be conducted in accordance with the source test procedures set forth in Appendix A of the IC Engine Compliance Plan. Source testing shall be conducted within 60 calendar days of replacement to determine the actual emission reduction associated with the new equipment. This source testing shall be in addition to, and not a replacement of, the annual source test as required by Section 9.1.C.(1)(b)(1) of this permit.

Page 41 of 88 Pages

9.1.C. Unit-Specific Compliance Monitoring [Reference : 40 CFR 70.6(a)(3)(a)(1)]

Summary Tables Of Compliance Monitoring Requirements:

EU: Gas-fired I. C. Engines Applicable Federal Requirement: APCD Rule 333

METHOD	DESCRIPTION OR REFERENCE METHOD ¹
MONITORING	Biennial source tests, based on APCD-approved source test plan for the source. NOx emission compliance to be checked, using a portable NOx analyzer, periodically as required by the APCD-approved engine inspection and maintenance plan for the source.(c.f.: APCD-issued PTO 7500). Also, any monitoring requirements listed in any NSR permits issued to the source since 8/2/1979
RECORD KEEPING	Maintenance of a written operation log for each engine, listing the following: monthly hours of operation including those for exempted engines, summary of all maintenance work done including maintenance work done on control devices, all observations made during each inspection. Maintenance of source test data according to APCD-approved source test plans. Also, any recordkeeping requirements listed in any NSR permits issued to the source since 8/2/1979
REPORTING	Reporting requirements are listed in the (a) APCD-approved source test plans (b) APCD-approved engine maintenance and operation plans and (c) APCD-issued NSR permits either based on the compliance plans for the source or otherwise issued to the source since 8/2/1979.
TEST METHODS	Source tests shall be performed using the following test methods: NOx, CO, O2 CARB Method 1-100; ROC - USEPA Method 18 or USEPA Method 25 Fuel Composition: ASTM Method D-1945-81, ASTM Method D-3588-81 and ASTM Method D-1072-80. Other test methods, comparable in accuracy to methods listed above and approved by the USEPA and the Cal-EPA/ARB, may also be used provided prior approval has been obtained from the APCD

comments:

EU: Gas-fired I. C. Engines; Applicable Federal Requirement: APCD Rule 309

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	As required by any federally-enforceable permits (e.g., ATCs issued prior to 8/79) issued by the APCD to the source or any APCD-approved compliance monitoring plan. The following apply: SO ₂ /PM ₁₀ emissions monitoring required when using PUC-quality gas as fuel, since the source meets the rule standards presumptively.
REPORTING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
RECORDKEEPING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
TEST METHODS	As stipulated in any federally-enforceable permits or plans issued by the APCD to the source.

comments:

EU: Gas-fired I. C. Engines ; Applicable Federal Requirement: APCD Rule 311

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	As required by any federally-enforceable permits (e.g., ATCs issued prior to 8/79) or any APCD-approved compliance monitoring plan issued by the APCD to the source
REPORTING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
RECORD KEEPING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
TEST METHODS comments:	As stipulated in any federally-enforceable permits or plans issued by the APCD to the source.

(1) **Source Testing** — For all IC engines listed in Table 9.1.4 below, the permittee shall perform biennially (annually for units with ID #'s 2-9) source testing of air emissions and process parameters listed in Table 9.1.4 below. [*Reference: APCD Rules 333.G.1.b,* 333.G.2,333.G.3, *ATC 7500*]

Table 9.1.4 SOURCE TEST REQUIREMENTS (a)(b)(e)(f) SUMMARY

IC Engine ID #	Pollutant or Operation Parameter	Emission: Concentration Limit (ppmvd) (c)	Emission: Mass Rate Limit for each IC engine (Ibs/hr) ^(d)	Remarks
2 - 8	NOx	50 @ 15% O2	2.37/ (90% effy)	None
1A - 3A	NOx	50 @ 15% O2	0.34	Measure

Page 42 of 88 Pages

20A	NOx	50 @ 15% O2	0.3	Measure
6A - 11A	NOx	50 @ 15% O2	0.14	Measure
16A	NOx	50 @ 15% O2	0.09	Measure
9	NOx	125 @ 15% O2	4.56	Measure
2 - 8	VOC (ROC)	250 @ 15% O2	2.34	None
1A - 3A	VOC (ROC)	250 @ 15% O2	1.56	Measure
20A	VOC (ROC)	250 @ 15% O2	1.34	Measure
6A - 11A	VOC (ROC)	250 @ 15% O2	0.62	Measure
16A	VOC (ROC)	250 @ 15% O2	0.42	Measure
9	VOC (ROC)	750 @ 15% O2	24.80	Measure
2 - 8	СО	4,500 @ 15% O2	27.81	None
1A - 3A	СО	4,500 @ 15% O2	18.83	Measure
20A	СО	4,500 @ 15% O2	16.29	Measure
6A - 11A	СО	4,500 @ 15% O2	7.54	Measure
16A	СО	4,500 @ 15% O2	5.05	Measure
9	СО	4,500 @ 15% O2	99.93	Measure
Engines subj. to source testing	Fuel UltimateAnalysis			Measure
Engines subj. to source testing	Fuel Flow, scf/hr			Measure
Engines subj. to source testing	Exhaust Oxygen, %			Measure
1A - 3A, 20A, 6A	Ign.Timing, AFR Controller			Document setting used in
- 11A	Make/Model, Set Points			source testing
16A	a.Cooling Fan Pitch			Document setting used in
	b.Governor RPM setting & actual value			source testing
	c.Ignition Timing (°BTDC)			
9	Ignition Timing (BTDC)			Document setting used in
3	ignicon finning (D1DO)			testing. Verify conformance with
				PTO regarding fuel use, fuel
				HHV & heat input

Page 43 of 88 Pages

Table 9.1.4 SOURCE TEST REQUIREMENTS (a)(b)(e)(f) Summary (Cont'd)

IC Engine ID #	Pollutant or Operation Parameter	Emission: Concentration Limit (ppmvd) (c)	Emission: Mass Rate Limit for each IC engine (lbs/hr) ^(d)	Remarks
2 - 8	a. Catalyst NOx reduction effy. b. Stack temperature c. Fuel composition d. Engine load, limited to 90% of maximum			Document setting used in testing.

Notes:

- a. All emission and process parameter tests shall be performed consistent with APCD protocol.
- b. All source tested values shall be reported at std. cond. (60°F & 14.69 psia), or as otherwise specified.
- c. Refer to APCD Rule 333.D for the exact wording on this limit.
- d. As specified in Table 9.1.3 in this permit.
- e. Tests shall be performed at IC engine output (BHP) determined by listed fan pitch & RPM.
- f. Source test will establish values for emission calculations and Rule 333 I&M requirements.

(a) IC Engines With ID #'S 2 - 9, 16A:

- (1). **Source Test Plan** SoCalGas shall submit/confirm to the APCD a "Source Test Plan" at least thirty (30) calendar days prior to the start of source testing. The plan must be approved by the APCD prior to initiation of source testing. The Source Test Plan shall be prepared consistent with the latest revision of the APCD's <u>Source Test Procedures Manual</u> (available from the APCD upon request). Also, shall notify the APCD at least fourteen (14) calendar days prior to the start of source testing activity to arrange for a mutually agreeable source test date when the APCD personnel may observe the test. [*Reference: APCD Rule 333.G.1.a*]
- (2). **Test Results** SoCalGas shall submit source test results to the APCD within forty-five (45) calendar days following the date of source test completion. The source test results report shall be consistent with the requirements approved within the Source Test Plan. [*Reference: SoCalGas PTO 7500*]
- (3). **Limits Exceedance** Any APCD-certified IC engine source test result which indicates the applicable emission limits, i.e., Rule 333.D emission limits or NSR permit-specified limits (as specified in Table 9.1.3), have been exceeded shall constitute a violation of the Clean Air Act and of this permit. [*Reference: APCD Rules 1303.D.1.j, 206*]
- (b) IC Engines With ID #'S 2 8: [Reference: SoCalGas PTO 7500]

Source test requirements addressed in the source test plan are as follows:

- (1). **Annual Source Test Program** SoCalGas shall conduct annual third party source testing, using APCD-approved methodology, to ensure compliance with the required emission reductions ("compliance testing"). The tests shall consist of three (3) forty minute runs for each pollutant;
- (2). **Pollutants** Tests shall be conducted to determine VOC (ROC), CO and NOx emission rates within the most recently established minimum, maximum and optimum AFRC set point range prior to any adjustment to these setpoints. Catalyst NOx reduction efficiency shall be determined if deemed necessary by the APCD;
- (3) **Setpoint Adjustments** Following third-party source testing specified above, if adjustments to the minimum or maximum AFRC setpoints are made, additional source testing shall be conducted. This testing may be conducted by SoCalGas source test equipment consistent with the source test procedures set forth in Appendix A of the IC Engine Compliance Plan.

Page 44 of 88 Pages

- (4). **Test Parameters** Tests shall be conducted at an engine load at a minimum of 90% of rated horsepower. Fuel consumption shall be monitored at each engine. Fuel heating value, stack temperature and fuel gas composition shall also be determined. Source tests performed at loads significantly less than 90% of rated horsepower may be invalidated or be subjected to APCD emission correction factors:
- (5). **Test Reports** The source test report shall be submitted to the APCD within 45 calendar days following the date of source test completion. The report format and content shall be consistent with the requirements set forth in the approved source test plan.
- (6). **Test Dates** The first source test date of September 15 shall be the anniversary date for all future source tests. Source tests must be performed within one month of the anniversary date, unless otherwise approved by the APCD. More frequent source testing may be required at the discretion of the APCD upon demonstration of reasonable need. Annual source test(s) shall be performed even if an additional source test occurs during the year (e.g., for replacement or retesting). However, if source test(s) for replacement or retesting occurs within 30 calendar days of the anniversary date for annual source testing, it will be considered the annual source test.
- (7). **Engines Not Operational** A source test shall not be required for equipment not in operation during the time of annual source testing. However, when such equipment becomes operational, a source test shall be performed within 30 calendar days of start-up. The APCD shall be notified in writing at least 3 working days in advance that the affected equipment will become operational.
- (c) IC Engine With ID # 9: [Reference: SoCalGas ATC 9075]
- (1). **Test Date** The source test date of September 15, 1995 shall be the anniversary date for all future source tests. Biennial source tests must be performed within one month of the anniversary date, unless otherwise approved by the APCD.
- (2). **IC Engine Load Conditions** The engine, whenever possible, shall be source tested at or above ninety (90) percent of its maximum rated heat input, or rated BHP output shown in Table 9.1.4. Confirmation of the engine's rated BHP output, when required, shall be verified through an APCD-approved methodology incorporated into the source test plan. The engine heat input (MMBtu/hr) source tested is shown in Table 9.1.4. The APCD will modify Table 9.1.4 if any engine source test results show that the engine was tested at less than ninety percent of its maximum heat input rating.
- (3). **Supplemental Source Testing** The APCD may require the permittee to perform a supplemental source test at any time prior to the biennial source test requirement, if in the APCD's judgment, the load for the IC engine with ID #9 significantly exceeds the value established for it pursuant to a prior source test and resultant revised condition 9.1.B.(2)(f) (*Maximum Heat Input*) of this permit. If a supplemental source test is required, it shall be performed within ninety (90) days according to the requirements listed in 9.1.C (1)(a) (1) -(4) (*General Source Test Requirement*) of this permit. The APCD may, at its discretion, extend the deadline in this condition.

During each biennial source test cycle, conditions 9.1.C.(1)(c)(1)& (2) (IC Engine Load Conditions & Supplemental Source Testing) above shall remain in force until a valid and compliant source test is performed at or above ninety (90) percent of the rated engine heat input of each engine shown in table in 9.1.B.(2)(f) (Maximum Heat Input) of this permit.

Page 45 of 88 Pages

SoCalGas: La Goleta Plant

This condition does not limit the APCD's discretion to require emissions source testing for other reasons t specified herein.

(d) IC Engine With ID # 16A: [Reference: SoCalGas ATC 8946]

IC Engine Load — This IC engine shall be source tested in an "as found" condition at the operational load defined by the following parameters: (1) the cooling fan pitch (2) the IC engine governor RPM setting and actual RPM and (3) the IC engine ignition timing. The settings for these parameters are documented in the APCD-approved Inspection and Maintenance Plan (I&M Plan) for this engine submitted on June 18, 1993.

If SoCalGas elects to increase the IC engine load (i.e., via increased fan pitch and or engine RPM) beyond those authorized in the I&M Plan, the Plan shall be updated and submitted for approval to the APCD. A supplemental IC engine exhaust emission source test per Rule 333.G shall also be performed within sixty (60) calendar days of the load change to demonstrate continued compliance with Rule 333 exhaust emission limits.

Page 46 of 88 Pages

SoCalGas: La Goleta Plant

(2) <u>Periodic Monitoring</u> —

- (a) All IC Engines:
- (1) **Compliance Plan** SoCalGas shall implement all periodic monitoring related

provisions of its IC engine compliance plans for its applicable engines, as approved by the APCD. [Reference: APCD Rule 333.E, H]

- (2). **Fuel Heating Value** The gross heating value of the gaseous fuel (Btu/scf) shall be measured using approved ASTM or ARB-approved test methods **quarterly**, unless otherwise required in the current APCD operating permits incorporated in Appendix 1 of this permit [*Reference: Reference: SoCalGas ATCs 8946,9075,9162 and PTOs 7500, 8008*]
- (3). **Fuel Sulfur Content** The total sulfur content and H2S content of the gaseous fuel burned on the property shall be analyzed and determined **quarterly** using approved ASTM or ARB-approved test methods. [*Reference:* SoCalGas ATCs 8946, 9075, 9162 and PTOs 7500, 8008]
- (4). **Operating Hours** The hours of operation each month of each engine shall be documented in a log book, which would be available for inspection. [*Reference: APCD Rule 333.H.1.a*)]
- (b) IC Engines With ID #'S 2 8: [Reference: SoCalGas PTO 7500]
- (1). **NOx Monitoring** SoCalGas shall conduct quarterly NOx emission inspections consistent with Rule 333.E.4. These inspections shall be conducted prior to any adjustments to the minimum and maximum setpoints and shall be consistent with SoCalGas source test equipment and procedures set forth in Appendix A of the IC Engine Compliance Plan. Quarterly inspections shall consist of a minimum of one (1) fifteen minute run at the previously established optimum set point.
- (2). **Fuel Use Metering** Fuel use for each engine shall be monitored by an in-line fuel meter. Meter design and specifications shall be approved by the APCD. The meters shall be calibrated annually and the calibration procedures shall be approved by the APCD.
- (3). **AFRC Setpoint Optimization** SoCalGas shall be permitted, at any time, to conduct emissions testing for the purpose of optimizing the AFRC setpoint range with "in-house" source test equipment subject to the following conditions:
- a. For the purpose of APCD observation, SoCalGas shall verbally inform the APCD when such testing shall be conducted three (3) days prior to the scheduled test date;
- b. Emissions testing shall be conducted consistent with the equipment and procedures set forth in Appendix A of the IC Engine Compliance Plan. Any source testing which results in adjustments to the minimum, maximum and optimum setpoints (millivolt display) shall consist of a minimum of one (1) fifteen minute run; and
- c. Within seven (7) days of the completion of any testing, SoCalGas shall provide the APCD with a written report summarizing SoCalGas' concern and/or engine conditions that initiated the emissions testing, engine compliance status as indicated by test results, and any changes to setpoints made as a result of the testing.
- (c) IC Engines With ID # 9, 15A 18A, 1A 3A, 20A, and 6A 11A : [References: SoCalGas ATCs 9075, 8946 and 9162]

Fuel Use Monitoring — For these IC engines, the permittee shall monitor fuel usage per its Fuel Use Monitoring Plan, dated April 1992, or any subsequent APCD-approved revision. The Fuel Use monitoring Plan and required records shall be readily available on-site for review by the APCD Inspection staff upon request.

Page 47 of 88 Pages

SoCalGas: La Goleta Plant

(d) IC Engines With ID #'S 4A, 5A, 14A and 19A: [Reference: SoCalGas PTO 8008]

- (1). **Fuel Use Monitoring** For these IC engines, the permittee shall comply with the Fuel Use Monitoring Plan, submitted by the permittee and approved by the APCD on June 29, 1889. The Fuel Use monitoring Plan shall be maintained on-site and shall be made available to the APCD personnel upon request. The plan may be modified only upon written approval by the APCD.
- (2). **Fuel Sulfur Testing** The concentration of sulfur compounds (calculated as H2S at standard conditions, 60° F and 14.7 psia) in the gaseous fuel shall be tested each quarter. The testing shall measure the total sulfur content of the fuel in accordance with current ASTM- D 1072 or an APCD-approved equivalent method. The frequency of testing may be modified provided that onsite measurements indicate to the satisfaction of the APCO that such a modification is reasonable for continued compliance determination.

9.1.D. Recordkeeping. Reference: [40 CFR 70.6(a)(3)(ii)]

The written records listed below shall be maintained, for a minimum of *five years*, by the permittee and shall be made available to the APCD upon request. [*Reference: APCD Rule 1303.D.1.f, 40 CFR 70.6(a)(3)*]

(1) Requirements for All IC Engines —

- (a) **Hours**: Records documenting individual IC engine operating hours each month [*Reference: APCD Rule 333.H.*]
- (b) **Fuel Use**: Records documenting IC engine(s) fuel consumption (scf/month) on a monthly basis, or as required by their current APCD PTO's incorporated in Appendix 1 [*Reference: Reference: SoCalGas ATCs 8946,9075,9162 and PTOs 7500, 8008*]
- (c) **Fuel Heating Value**: Records documenting the gross heating value of fuel (Btu/scf) on an annual basis [*Reference: SoCalGas ATCs 8946,9075,9162 and PTOs 7500, 8008*]
- (d) **Fuel Sulfur Content**: Records documenting the total sulfur content and H2S content of the gaseous fuel on a quarterly basis. [*Reference: SoCalGas ATCs 7500,8946,9075,9162 and PTO 8008*]
- (e) **Equipment Maintenance Data**: Records summary documenting engine/control device maintenance on an annual basis. [Reference: APCD Rule 333.H.1c),d)]
- (f) **Equipment Hours**: Records documenting location and hours of operation for IC engine 14A which claims exemption from Sections D, E, F and G of Rule 333 based on Rule 333.B.2, summarized annually. [*Reference: APCD Rule 333.H.1.b*)]
- (g) **I&M Plan Logs**: Logs documenting the parameter settings, NOx level recorded and other values required under the Inspection and Maintenance Plan for each engine subject to Rule 333.D (Emission Concentration Limits) and kept on-site [Reference: APCD Rule 333.H.1.e)]
- (h) **Equipment ID/Tags**: If an operator's tag number is used in lieu of an IC engine identification plate, written documentation which references the operator's unique IC engine ID number to a list containing the make, model, rated maximum continuous BHP and the corresponding RPM. [Reference: SoCalGas ATCS 8946,9075,9162 and PTOs 7500,8008]

Page 48 of 88 Pages

SoCalGas: La Goleta Plant

(2) IC engines with ID #'s 2-8 only — [Reference: SoCalGas PTO 7500]

To adequately verify that the emission reductions specified in this permit are actually being attained and are so attained in compliance with the APCD SIP-approved Rules and Regulations, SoCalGas shall maintain the following quarterly records for each engine, 2 - 8, for a minimum of five (5) years:

- (a). **Monthly Emission Records**: Records on monthly fuel use (in units of scf), monthly hours of operation, the number of days in operation each month, the average higher heating value and sulfur content of fuel. Include a copy of the most recent lab analysis of the fuel.
- (b). **Setpoint Settings Data**: A record of the most current minimum, maximum and optimum Air Fuel Ratio Controller setpoints and the date these were established.
- (c). **Engine Operation Outside Settings**: A record of any continuous engine operation [as described in Section 9.1.B(2)(c)(6)] not within minimum and maximum setpoints as indicated by the daily millivolt monitoring described in the IC Engine Compliance Plan. The minimum and maximum setpoints shall be those most currently established and which have demonstrated compliance through emissions set forth in Appendix A of the IC Engine Compliance Plan.
- (d). **Maintenance Records**: Records on all maintenance performed for all equipment specified in this permit including engine time settings, engine maintenance, catalyst maintenance and air-fuel ratio controller.
- (e). **Control Equipment Parameters**: Records on catalyst (including manufacturer, model and serial numbers), engine, air-fuel ratio controller, or sensor replacement.
- **9.1.E REPORTING**. [*Reference:* 40 CFR 70.6(a)(3)(iii)]
- (1) Annual Reporting By March 1 of each year, a report detailing the previous calendar year's activities shall be provided to the APCD by the permittee. The report shall list all data generated pursuant to the Recordkeeping conditions 9.1.D.(1) and (2) of this permit listed above, except for IC engines 2 through 8 listed in this permit Table 9.1.1. [Reference: SoCalGas ATCS 7500,8946,9075,9162 and PTO 8008]
- (2). **Quarterly ERC data** The *quarterly* records maintained for IC engines 2 through 8 listed in Table 9.1 of this permit, as required by condition 9.1.4.(1) shall be provided to the APCD *within 30 calendar days after the end of each quarter.* [Reference: SoCalGas Gas PTO 7500]
- (3). **Electronic Submittal of Data** The applicant may, with prior approval from the APCD, submit the report on a computer disk instead of a hard copy medium. The APCD will specify the format for disk reporting. [Ref.: APCD Rule 1303]

Page 49 of 88 Pages

9.2 Conditions for Permitted Dehydration/Storage/Metering Units at La Goleta

Table 9.2.1 Equipment List & Applicable Prohibitory/Breakdown Rules and NSR Limits for Dehydration, Storage and Odorant Metering Units.

ID#	EQUIPMENT	Rule 301	Rule 303	Rule 310	Rule 326	Rule 323	Rule 346	Rule 505	BACT/ Offset	Other Reg.
Dehyd	Iration Plant Unit #14:									•
#1	Underground gas storage wells , 21 in #									
#2	Gas/glycol contactors, three (3); Braun & Lacy; each 4.5' dia. by 37.8' long; with control tanks, three (3), each 16" dia. by 15' long.	√	√	√				✓		
#3	Gas/glycol contactor; Braun & Lacy; 4.5' dia. by 38.9' long; with a control tank 16" dia. by 15' long.	✓	√	√				✓		
#4	Glycol/glycol heat exchangers, four (4); Griscom-Russel: each 5.25' tall by 23' long.	✓	√	√				✓		
#5	Glycol/steam heat exchangers, two(2); Griscom- Russel: each 4.25' tall by 24' long.	✓	✓	✓				✓		
#6	Glycol rectifier; Southwestern Engineering; 25" diameter.	✓	✓	✓				✓		
#7	Vapor Condensing coils; Happy Co.; 4.0' wide by 18' long.	✓	✓	✓				✓		
#8	Accumulator stack, closed and drip pot; Koenig; 0.67 feet dia. by 18' long.	✓	✓	✓				✓		
#9	Glycol particulate filters, two (2); Rol-Pak; each 1.7' dia. by 4' long	✓	√	√				✓		
#10	Glycol/gas separator; Southwest Welding; 4' dia. by 10.2' long	√	√	√				✓		
#11	Glycol pumps, five (5), each driven by a 7.5 hp electric motor	✓	√	√				✓		
#12	Rectifier pumps, two (2), each driven by a 7.5 hp electric motor	✓	√	√				✓		
#13	High pressure separator, V-100, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	✓	√	√				√		ATC 9128
#14	Sand trap, V-200, welded construction, horizontal, 3' dia. by 19.8' long; connected to gas collection system.	✓	✓	✓				√		ATC 9128
#15	Low pressure separator, V-101, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	√	√	✓				✓		ATC 9128
#16	Valves, flanges and other components in liquid and gas services emitting HCs	✓	✓	✓				✓		ATC 9128

Page 50 of 88 Pages

Table 9.2.1 Equipment List & Applicable Prohibitory/Breakdown Rules & NSR Conditions for Dehydration, Storage and Odorant Metering units (Cont.)

ID#	EQUIPMENT	Rule 301	Rule 303	Rule 310	Rule 326	Rule 323	Rule 346	Rule 505	BACT/ Offset	Other Req.
Dehyd	ration Plant Unit # 14A:									
# 17	Gas/glycol contactors, two (2); Braun; 5.9' dia. by 35.6' long; with control tanks, two (2), 2' dia. by 15' long and 2' dia. by 17' long.	✓	√	√				√		
# 18	Glycol/gas separator; Southwest Welding; 5.5' dia. by 13.6' long	√	✓	✓				√		
# 19	Glycol particulate filters, four (4); Butane Tank Corp.; 0.75' dia. by 4' long.	\	✓	√				✓		
# 20	Glycol/glycol heat exchanger; Thermal Finned Tube Processor Inc.; 6.6' tall by 17.5' long.	\	✓	✓				✓		
# 21	Glycol/steam superheaters, two (2); Brown; each 10' tall by 21' long.	\	✓	✓				✓		
# 22	Glycol rectifier; Southwestern Eng.; 26" diameter.	\	✓	√				✓		
#23	Vapor condensing coils; Air-X-Changer; 0.67' wide by 7.3' long.	√	✓	√				√		
#24	Accumulator stack, closed and drip pot; Koenig; 0.67' dia. by 18' long.	\	✓	√				✓		
# 25	Glycol pumps, three (3), each driven by a 7.5 hp electric motor.	\	✓	✓				✓		
# 26	Glycol pump, driven by 15 hp electric motor.	✓	✓	✓				✓		
# 27	Rectifier pumps, two (2), each driven by a 7.5 hp electric motor	✓	✓	✓				✓		
# 28	High pressure separator, V-100A, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	✓	✓	✓				✓		ATC 9128
# 29	Sand trap, V-200A, welded construction, horizontal, 3' dia. by 19.8' long; connected to gas collection system.	√	√	✓				✓		ATC 9128
# 30	Low pressure separator, V-101A, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	✓	√	✓				√		ATC 9128
#31	Valves, flanges and other components in liquid and gas services emitting HCs	✓	✓	✓				✓		ATC 9128
Tank F	Farm:									
# 32	Flotation cells, two (2), 10,000 gallons capacity each; 12' dia. by 12' height each.	✓	✓	✓				✓		
# 33	Hydrocarbon storage tank, 7,050 gal. capacity, 10' dia. by 12' height.	✓	✓	✓	✓			✓		
# 34	Brine water storage tank, 40,600 gal. capacity; 24' dia. by 12' height	✓	✓	✓				✓		
# 35	Condensate pump serving the storage tanks; 5 hp electric motor drive.	✓	✓	✓				✓		
# 36	Grade level loading station to load HC condensate to tanker trucks by motor driven pump; t equipped with VRU	✓	√	√			√	✓		

Page 51 of 88 Pages SoCalGas: La Goleta Plant

Table 9.2.1 Equipment List & Applicable Prohibitory/Breakdown Rules & NSR Conditions for Dehydration, Storage and Odorant Metering units (Cont.)

ID#	EQUIPMENT	Rule 301	Rule 303	Rule 310	Rule 326	Rule 323	Rule 346	Rule 505	BACT/ Offset	Other Reg.
Metha	nol Storage Tanks:			0.0					0001	11041
# 37	Methanol storage tanks, two (2), 500 gallons capacity each, pressurized with natural gas; with pressure relief valve.	√	√	✓				√		
# 38	Pneumatic Pumps, two(2), serving the methanol tanks.	✓	✓	✓				√		
Other	Equipment:									
# 39	Stack gas vents, for use in pipeline depressurizing operations.	√	✓	✓				√		
# 40	Piping, valves and flanges, not associated with other permitted equipment items but emitting fugitive hydrocarbons.	✓	✓	√				✓		
Odora	nt/Metering Station # 14:									
# 41	Odorant storage tank, one (1) in ., designated as PV544: 2.2' dia. by 22.0' long; 568 gallons: relief valve set @ 15.0 psig, odorant Captan 50	√	✓	√				✓		
# 42	Odorant storage tank, one (1) in ., designated as PV597: 2.2' dia. by 13.5' long; 350 gallons: relief valve set @ 125 psig, odorant Captan 50	✓	✓	✓				<		
# 43	Odorant run tank, one (1) in ., designated as PV1044C: 22" dia. by 4.7" long; 90 gal.: relief valve set @ 495 psig.	✓	√	✓				<		
# 44	Metering Pump, One (1) in ., Morgan: Model HD 562, S.N. 89-348A; operated on compressed air.	✓	✓	✓				✓		
Odora	nt/Metering Station # 14A :									
# 45	Odorant storage tank, one (1) in ., designated as PV503: 3.6' dia. by 16.0' long; 1000 gallons: relief valve set @ 33 psig, odorant Captan 50	√	√	√				√		
# 46	Odorant run tank, one (1) in ., designated as PV610: 16" dia. by 4.2' long; 43 gal.: relief valve set @ 500 psig.	✓	✓	√				✓		
# 47	Metering Pump, One (1) in ., Morgan: Model HD 562, S.N. 89-348B; operated on compressed air.	√	√	√				✓		
Other	equipment at Stations 14 & 14A:									
# 48	Fugitive emission sources: flanges - 6; relief valves - 5; needle valves - 27; ball valves - 37; plug valves - 15; threaded fittings - 811.	√	√	√				√		

Page 52 of 88 Pages

Table 9.2.2 Applicable generic emission limits & standards for Dehydration/Storage/Metering — Summary

Applicable Requirement	Permit Cond. # 9.2.A	Pollutant/Paramet er	Limits/Standards ¹	Monitoring Method	MTRG ² Cond. § 9.2
APCD Rule 301	(1)	All pollutants	No circumvention of any mass concentration limits through effluent stream dilution	Annual APCD Source Inspection	Comply w/other cond.
APCD Rule 303	(2)	Air Contaminants	No nuisance: also, no endangering of health, safety comfort; nor cause damage to any property/business.	Maintaining a complaint log on-site.	A.(2)
APCD Rule 310	(3)	Odorous organic sulfides	Ground level conc. of sulfides (as H2S) outside the property line t to exceed .03 ppm hourly or .06 ppm over 3 minutes.	Source Inspection & Periodic Checks by APCD staff	A.(3)
APCD Rule 323	(4)	VOC from architectural coatings	As specified in the Table of Standards in Rule 323.D for listed coatings; for all other coatings, 250g VOC/liter coating	Source Inspection by APCD staff & Reports on Paints Used	A.(4); Also see # D.(6)

Table Notes: 1 -- Requirement summarized; refer to APCD Rule and Section § listed in Column 1 for full text. 2 --"MTRG" stands for Monitoring.

9.2.A Generic Emission/Operation Limits For Dehydration, Storage & Metering Units [Reference: 40 CFR 70.6(a)(1)]

- Circumvention No emission shall be concealed using diluent air or without any actual (1) required pollution reduction [Reference: APCD Rule 301].
- (2) **Nuisance** — No pollutant emissions from any equipment shall create nuisance conditions offsite [Reference: APCD Rule 303]; complaint logs shall be maintained on-site to record any nuisance complaint reported to the APCD which requires SoCalGas mitigation action. APCD's Regulatory Compliance Manual, Section IV, lists nuisance enforcement measures.
- (3) Odorous Organic Sulfide Emissions — Emissions from any Dehydration/Storage unit shall not cause the ground level concentration of sulfides (measured as H2S) at any point at or outside the stationary source boundary to exceed the limits listed below. Compliance shall be verified during periodic inspections by the APCD staff.

(a) 0.03 ppmv, averaged over one hour; or (b) 0.06 ppmv averaged over 3 minutes. [Reference: APCD Rule 310]

Page 53 of 88 Pages

SoCalGas: La Goleta Plant

VOC Emissions From Architectural Coatings — Any coating used within the boundary of the stationary source shall not contain VOC exceeding the following limits:

For coatings listed in the Table of Standards appended to Rule 324.D, the limits specified in the Table of standards; for all other coatings, the limit of 250 g VOC per liter of such coatings (less water and exempt solvents and excluding any colorant added to tint bases). SoCalGas shall keep a record of paints/coatings used. [Reference: APCD Rule 326.D]

Table 9.2.3 Estimated Unit-Specific Emissions & Monitoring Methods for Dehydration/Storage units — Summary

Unit. ID#	Applicable Requirement	Permit Cond. # 9.2.B	Limit/Standard ¹	Monitoring Method	MTRG ² Condition # 9.2. C
			Pollutant : VOC		
# 32, Flotn. cells 2 in .	Rule 326. D.1, D.2, and E.3	(2)(iii)	Tank must be equipped with a vapor loss control device with a minimum vapor removal efficiency of 95%	Vapor loss control device (enclosed flare) inspection (also see Sec. 9.2)	(2)(a)(e)
# 33, HC storage tank	Rule 326. D.1, D.2, and E.3	(2)(iii)	Tank must be equipped with a vapor loss control device with a minimum vapor removal efficiency of 95%	Vapor loss control device (e.g., enclosed flare) inspection (also see Sec. 9.2)	(2)(a)(e)
#s 13-15 & 28-30 fug. emis.	ATC 9128, Table 1		0.88 lb/hr,21.12 lbs/day & 3.87 t/yr. (Emissions based on actual number of fug. em. components)	Recordkeeping & annual reporting	(2)(a)(b)(c)
# 48 fug. emis. compnts.	ATC 8335		0.52 lb/hr, 12.48 lbs/day & 2.29 t/yr. (Emissions based on actual number of fug. em. components)	Recordkeeping & annual reporting	(2)(a)

Table Notes: 1 -- Requirement summarized; refer to APCD Rule and Section § listed in Column 2 for full text. 2 -- "MTRG" stands for Monitoring.

9.2.B Unit-Specific Emissions/Operations Limitation. [Reference: 40 CFR 70.6 (a)(1)]

(1) **EMISSION LIMITS** — VOC emissions from the dehydration and storage units listed in Table 9.2.1 shall not exceed the emission limits specified in Table 9.2.3 for relevant units. Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit. [*Reference: SoCalGas ATC 9128*, 8335]

(2) OPERATIONAL LIMITS

- (a) **Vapor Recovery System Operation**: Any volatile organic compound (VOC) liquid may not be stored in the hydrocarbon storage tank (ID# 33) listed in Table 9.2.1, unless the tank is equipped with a vapor loss control device having a vapor removal efficiency of at least 95% by weight, e.g., a vapor recovery unit assisted by a flare. Vapor recovery systems, including all piping, valves, and fittings shall be operated in a leak-free condition to minimize the release of reactive organic vapors. [*Reference: APCD Rule 326*]
- (b) **Tank Cleanout:** Vapor recovery shall be used on tanks so equipped during filling or flushing and emptying procedures, prior to opening tanks for cleanouts. [*Reference: APCD Rule 326 B.3.b.4*)]
- (c) **Loading Rack**: Hydrocarbon condensates shall not be transferred to an organic liquid cargo vessel unless a submerged or bottom load filling technique is used. [*Reference: APCD Rule 346 D.1*]
- (d) **Liquid Hydrocarbon Transport**: Organic liquids shall not be transported in organic liquid cargo carriers unless all hatches, valves and fittings are closed. [*Reference: APCD Rule 346 E.3*]
- (e) **Odorant Tank Filling**: Emissions of VOCs to the atmosphere resulting from tank filling operations shall be reduced by passing displaced vapors through a vapor recovery system with a control efficiency greater than 90 percent. Odorant emissions shall not be detectable, by olfactory senses, at or beyond the property boundary at any time during tank filling operations. [Reference: SoCalGas ATC 8335]

Page 54 of 88 Pages

SoCalGas: La Goleta Plant

9.2.C Unit-Specific Compliance Monitoring [Reference: 40 CFR 70.6(a)(3)(1)]

EU: Petroleum Liquid Storage Tanks; Applicable Federal Requirement: APCD Rule 326

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	If a breakdown occurs to any tank and the requirements of Rules 505/1303 are met, then the following must be monitored: date, time and duration of breakdown and calculated excess emissions during the breakdown.
RECORD KEEPING	Records shall be maintained for the following: (a) the type of liquid stored in each tank, (b) the maximum vapor pressure of the liquid, if such data is not available from Rule 326, Table A. Also, all records required to justify any exemptions claimed from any rule provisions, e.g., maintenance records where excess emissions occur during maintenance. All records are to be maintained for a minimum of five years.
REPORTING	The owner/operator of each tank shall report the following information to the APCD: (a) Location of the tank and the APCD permit # for the tank (b) The product stored and its vapor pressure and (c) The current compliance of the tank with respect to Rule 326 requirements.
TEST METHODS	Vapor removal efficiency and ROC emissions: CARB Methods 202 and 203 (as published in CARB's Stationary Source Test Methods, vol. 2, 9/12/1990); Reid vapor pressure: ASTM Method D-323-82 (modified per Rule 325.G.2.a); API gravity: ASTM Method D-287-82; Sampling for API gravity determination: ASTM Method D-4057-88;

comments:

- (1). **Source Testing** The dehydration/storage/metering equipment listed in Table 9.2.1 of permit are not subject to any source testing requirements
- (2) **Periodic Monitoring** SoCalGas will monitor the following operational and process parameters:

API Gravity & True Vapor Pressure Of Stored HC — The API gravity and the true vapor pressure at the maximum expected storage temperature of the stored liquid hydrocarbon (condensate) in each storage tank shall be measured and recorded *annually*. Alternately, the Reid vapor pressure of the stored condensate may be measured by the ASTM D 323 Standard Method and the true vapor pressure calculated by API Bulletin 2517, or equivalent APCD-approved Reid/True vapor pressure correlation. The calculated true vapor pressure shall be based on the maximum expected operating temperature for each hydrocarbon condensate storage tank. This temperature shall also be recorded. [*Reference: APCD Rule 326.J,K*]

9.2.D RECORDKEEPING [Reference: 40 CFR 70.6(a)(3)(ii)]

The records listed below shall be maintained, for a minimum of five (5) years, by SoCalGas and shall be made available to the APCD upon request. [Reference: APCD Rule 1303.D.1.f]

(1) Volume of Coatings and Solvents — The amount of coatings and solvents used annually. This information must be logged for each coating and solvent. The log shall list (for each material) the quantity of material used, the volatile organic compound (VOC) content, whether the material is photochemically reactive per the definition of Rule 102.FF, and whether the material was applied to a surface or disposed of. A Material Safety Data Sheet (MSDS) or other product specification sheet, which specifies the VOC content of the material, shall be maintained with the log. [Reference: APCD Rule 317.B,322, 324]

SoCalGas may keep the log of solvent/coating use on a stationary source basis. Additionally, purchase and disposal records may be used to quantify solvents/coatings used and/or disposed of an annual basis.

Page 55 of 88 Pages

- (2) **Maintenance Records** Maintenance records where excess emissions occur during cleanups and other maintenance activities exempted by Sections B.3 and B.5 of Rule 326. These records contain, at a minimum, the following: [Reference: APCD Rule 326.J.1.c]
 - (a) **Tank Identification**: Tank identification type of vapor controls used, and initials of personnel performing maintenance.
 - (b) Maintenance Performed: Description of maintenance procedure performed.
 - (c) **Estimated Excess Emissions**: Excess emissions caused by maintenance and how determined.
 - (d) **Maintenance Dates & Times**: Times and dates of maintenance procedure.

9.2.E Reporting [Reference: 40 CFR 70.6(a)(3)(iii)]

- (1) Annual Reporting By March 1 of each year, a report detailing the previous calendar year's activities shall be provided by SoCalGas to the APCD (Attn.: RCD Annual Report Coordinator). The report shall list all data generated pursuant to the Recordkeeping conditions 9.2.D of this permit. The data shall be summarized on annual basis as required by the recordkeeping conditions listed above. [Reference: 40 CFR 70.6(a)(3)(iii)]
- (2) **Electronic Submittal of Data** The permittee may, with prior approval from the APCD, submit the report on a computer disk instead of a hard copy medium. The APCD will specify the format for such disk reporting [Reference: APCD Rule 1303]

Page 56 of 88 Pages

9.3 Conditions for Permitted Boilers At La Goleta

Table 9.3.1 Equipment List & Applicable Prohibitory/Breakdown Rules and NSR Conditions for Goleta Boilers.

ID#	EQUIPMENT	Rule 301	Rule 302	Rule 303	Rule 305	Rule 309	Rule 311	Rule 342	Rule 505	BACT/ Offset	Other Req.
#1	Natural gas-fired Boiler, Dixon, 5.021 MMBtu/hr heat input	✓	✓	✓	✓	√	✓	✓	✓		APCD ATC #8166
#2	Natural gas-fired Boiler, Dixon, 5.021 MMBtu/hr heat input	√	✓	✓	✓	✓	✓	√	√		APCD ATC # 8166

La

The generic emission limits applicable to the two Dixon boilers listed in Table 9.3.1 are tabulated below in a summary format, for convenience.

Table 9.3.2 Applicable generic emission limits & standards for Boilers — Summary

Applicable Requirement	Permit Cond.# 9.3.A	Pollutant/Parameter	Limits/Standards ¹	Monitoring Method	MTRG ² Cond. § 9.3.
APCD Rule 301	(1)	All pollutants	No circumvention of any mass concentration limits through effluent stream dilution	Annual APCD Source Inspection	Comply w/other cond.in PTO
APCD Rule 302.B	(3)(a)	PM/Visible Emissions	20% opacity, not to be exceeded over 3 minutes in any one hour	Annual APCD Source Inspection	A.(3)(a)
APCD Rule 303	(2)	Air Contaminants	No nuisance: also, no endangering of health, safety comfort; nor cause damage to any property/business	Maintaining a complaint log onsite.	A.(2)
APCD Rule 305	(3)(b)	PM	0.19 0.20 gr./dscf	Fuel Use	A.(3)(b)
APCD Rule 309.A.1	(4)(a)	SO2	2,000 ppmv	Fuel S Content	A.(4)(a)
APCD Rule 309.A.2	(3)(b)	PM	0.1 gr./dscf @ 12% CO2	Fuel Use	A.(3)(b)
APCD Rule 311.B	(4)(b)	SO2	15 gr. as H2S/100 cu.ft of gaseous fuel	Fuel S Content	A.(4)(a)

Table Note: 1 -- Requirement summarized; refer to APCD Rule § listed in Column 1 for full text. 2 -- "MTRG" stands for Monitoring

9.3.A. Generic Emission/Operation Limits For The Boilers [Reference: 40 CFR 70.6(a)(1)]

- (1) **Circumvention** No emissions shall be concealed using diluent air or without any actual required pollution reduction [*Reference: APCD Rule 301*].
- (2) **Nuisance** No pollutant emissions from any boiler shall create nuisance conditions off- site [Reference: APCD Rule 303]; complaint logs shall be maintained on-site to record any nuisance complaint reported to the APCD which requires SoCalGas mitigation action. APCD's Regulatory Compliance Manual, Section IV, lists nuisance enforcement measures.
- (3) **Particulate Emissions** Particulate emissions from any boiler shall not exceed the following limits:
 - (a) **Opacity**: A plume opacity, as dark or darker in shade or obscuring an observer's view to a degree equal to or greater than smoke designated as No. 1 on the Ringelmann Chart (as published by the US Bureau of Mines), for a period or periods aggregating more than three minutes in any one hour [*Reference: APCD Rule 302.B*]. Compliance with this condition is automatically met as long as the boilers are fired with natural gas (uncontrolled PM₁₀ emission factor equivalent to 0.007 gr./dscf), and are maintained with annual "tune ups" per APCD Rule 342.D.2.c.

Page 57 of 88 Pages

SoCalGas: La Goleta Plant

Santa Barbara County APCD FINAL Part 70 Permit 9584 - 01 Permit Expires on 1/12/03

- (b) **Mass Emissions Rate**: 0.1 grains per dry standard cubic foot, corrected to 12% CO2 at standard conditions of 60°F and 29.92 inches of mercury [*Reference: APCD Rule 309.A.2.b*]. Compliance with this condition is automatically met as long as the boilers are fired with natural gas (uncontrolled PM₁₀ emission factor equivalent to 0.007 gr./dscf).
- (4) **SO2 Emissions** SO2 emissions from any boiler shall not exceed the following limits:
 - (a) **SO2 ppmv**: 2,000 ppmv concentration of sulfur compounds, calculated as sulfur dioxide, at the point of discharge into ambient atmosphere [*Reference: APCD Rule 309.A.1*]. Compliance with this condition is automatically met as long as the boilers are fired with PUC grade natural gas (which currently contain less than 4 ppmv of H₂S and 80 ppmv of total sulfur compound].
 - (b) **H2S ppmv**: The gaseous fuel shall t contain sulfur compounds in excess of 15 gr./100 cubic feet (or, 238 ppmv), calculated as H₂S at standard conditions [*Reference: APCD Rule 311.B*] Compliance with this condition is automatically met as long as the boilers are fired with PUC grade natural gas.

Table 9.3.3 Applicable Unit-Specific Emission Limits & Standards for Boilers — Summary

Boiler ID #	Applicable Requirement	Permit Cond.# 9.3.B	Limit/Standard ¹	Monitoring Method	MTRG ² Cond. # 9.3.C
			Pollutant: NOx		
ID #'s 1,2	APCD Rule 342 D.2.d	(1)	30 ppmv @3% O2	Annual tune-up records	(2)(a)(b)
	PTO 9275 - Table 1	(1)	0.50 lb/hr, 12.0 lbs/day and 0.44	Tune-up data and fuel use	(2)(a)(b)
			ton/yr. for each boiler		

Page 58 of 88 Pages

SoCalGas: La Goleta Plant

Table Note: 1 -- Requirement summarized; refer to APCD Rule § listed in Column 2 for full text. 2 -- "MTRG" stands for Monitoring

Table 9.3.3 Applicable Unit-Specific Emission Limits & Standards for Boilers — Summary (Cont.)

Boiler ID#	Applicable Requirement	Permit Cond.# 9.3.B	Limit/Standard ¹	Monitoring Method	MTRG ² Cond. # 9.3.C			
			Pollutant : VOC (ROC)					
ID #'s 1,2	PTO 9275 - Table 1	(1)	0.03 lb/hr, 0.72 lb/day and 0.02 ton/yr for each boiler	Annual fuel use	(2)(a)(b)			
			Pollutant : CO					
ID #'s 1,2	APCD Rule 342 D.2.d		400 ppmv @ 3% O2	Annual tune-up records	(2)(a)(b)			
	PTO 9275 - Table 1	(1)	0.11 lb/hr, 2.64 lbs/day & 0.09 ton/yr for each boiler	Tune-up data and fuel use	(2)(a)(b)			
			Pollutant : SO2					
ID #'s 1,2	PTO 9275 - Table 1	(1)	0.06 lb/hr, 1.44 lbs/day and 0.06 ton/yr for each boiler	Fuel S content and annual fuel use	(2)(a)(c)			
	Pollutant : PM 10							
ID #'s 1,2	PTO 9275 - Table 1	(1)	0.06 lb/hr, 1.44 lbs/day and 0.05 ton/yr. for each boiler	Annual fuel use	(2)(a)(b)			

Table Note: 1 -- Requirement summarized; refer to APCD Rule § listed in Column 2 for full text. 2 -- "MTRG" stands for Monitoring

9.3.B Unit-Specific Emissions/Operations Limitation. [Reference: 40 CFR 70.6(a)(1)]

(1) **Emission Limits** — Specific pollutant emissions from each boiler listed in Table 9.3.1 shall not exceed the emission limits specified for it in Table 9.3.3 unless an USEPA-approved exemption to do so is obtained under Rule 505 listed in Table 9.3.1. The limits in Table 9.3.3 do not supersede any other limits that may be specified for the equipment by any applicable requirement promulgated by the USEPA or the APCD during the life of this permit.

Mass emission rates resulting from the operation of these boilers shall not exceed the values listed in Table 9.3.3. Compliance with this condition shall be based on fuel usage and gas utility company's total sulfur content analyses of their fuel.

- (2) **Operational Limits** The operational limits listed below shall apply to *all the boilers* listed in Table 9.3.1. Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit.
 - (a) **Fuel Type & Use:** Only **PUC grade natural gas** shall be used as fuel. Combined daily fuel use for the two boilers shall not exceed 228,571 scf. Compliance with this condition shall be based on annual analyses provided by SoCalGas to the APCD. [Reference: SoCalGas PTO 8166]
 - (b) **Fuel Use Metering**: Each boiler shall be operated equipped with an APCD-approved fuel use meter. [*Reference: ATC Rule 342.D.2.c*]
 - (c) **Equipment Tuning Requirements**: SoCalGas shall tune up each boiler at least once every twelve months. Tune up procedures shall be performed in accordance with the equipment tuning procedure described in Attachment #1 of APCD Rule 342. [Reference: ATC Rule 342.D.2.c]
 - (d) **Heat Input**: Based on the design rating of the boiler/burner and on the annual heat input limit requested by SoCalGas in its permit application, the maximum hourly and annual heat inputs (in units of <u>MMBtu/hr</u>) to the boilers are limited to the values listed below:

Boiler ID#	Max. Hourly Heat Input	<u>Max.Annual Heat Input</u>
1,2	5.021 (each boiler)	8,999 (each boiler)

Page 59 of 88 Pages

[Unless otherwise designated by the APCO, the heat content of the PUC quality natural gas fuel is assumed to be 1050 Btu/scf and this value is to be used to determine compliance with the operational limits] [Reference: SoCalGas PTO 8166]

9.3.C Unit-Specific Compliance Monitoring [Reference: 40 CFR 70.6(a)(3)(1)]

Summary Tables For Compliance Tracking Requirements:

EU: Natural Gas-fired Boilers; Applicable Federal Requirement: APCD Rule 342

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	Units shall be tuned at least once every 12 months in accordance with the procedures described in Attachment 1 of Rule 342. For any boiler unit, the Higher Heating Value and cumulative annual usage of fuel shall be monitored.
RECORD KEEPING	Documentation records shall be maintained to allow verification of the required tune-ups for qualifying units. For each unit, the monitored data for the High Heating Value of fuel and the cumulative annual usage of fuel shall be recorded. All records shall be kept for five (5) years for Part 70 sources, and shall be made available to the APCD upon request.
REPORTING	Reporting shall follow those listed in any federally-enforceable permits issued to the source.
TEST METHODS	(a) If certification of the HHV for the gaseous fuel is not provided by the third party fuel supplier, it shall be determined by the following test method: ASTM D 1826-88, or ASTM D 1945-81 in conjunction with ASTM D 3588-89. (b) Foe stack gas oxygen level measurements, EPA Method 3 or 3A shall be used.

Page 60 of 88 Pages

SoCalGas: La Goleta Plant

comments:

EU: Natural Gas-fired Boilers; Applicable Federal Requirement: APCD Rule 309

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	As required by any federally-enforceable permits (e.g., ATCs issued prior to 8/79) issued by the APCD to the source or any APCD-approved compliance monitoring plan. The following apply: SO_2/PM_{10} emissions monitoring required when using PUC-quality gas as fuel, since the source meets the rule standards presumptively.
REPORTING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
RECORD KEEPING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
TEST METHODS	As stipulated in any federally-enforceable permits or plans issued by the APCD to the source.

comments:

EU: Natural Gas-fired Boilers; Applicable Federal Requirement: APCD Rule 311

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	As required by any federally-enforceable permits (e.g., ATCs issued prior to 8/79) or any APCD-approved compliance monitoring plan issued by the APCD to the source
REPORTING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
RECORD	As required by any federally-enforceable permits or plans issued by the APCD to the source.
KEEPING	
TEST METHODS	As stipulated in any federally-enforceable permits or plans issued by the APCD to the source.

comments:

- (1). **Source Testing** The boilers listed in Table 9.3.1 of this permit are not subject to any source testing requirements, unless they are found to be out of compliance with the emission standards in Rule 342.D.2.c. (*annual tune up requirements*)
- (2). **Periodic Monitoring** For each of the boilers listed in Table 9.3.1 of this permit:
 - (a) **Fuel Heating Value**: The Higher Heating Value (HHV) of the gaseous fuel (Btu/scf) shall be analyzed *monthly* using the ASTM methods listed in Rule 342.H (test methods); alternately, test results of the fuel analysis shall be made available. Such analysis must be approved by the APCD in writing. [*Reference: APCD Rule 342.I.1*]
 - (b) **Fuel Metering**: The volume (scf) of natural gas consumed each month for each boiler must be monitored by fuel meters approved by the APCD. [Reference: APCD Rule 342.I.1]
 - (c) **Fuel Sulfur:** SoCalGas shall analyze fuel sulfur content *annually* per APCD-approved ASTM test methods for gaseous fuel sulfur content.

Page 61 of 88 Pages SoCalGas: La Goleta Plant

9.3.D RECORDKEEPING [Reference: 40 CFR 70.6(a)(3)(ii)]

The records listed below *for all boilers* shall be maintained, *for a minimum of five (5) years*, by the permittee and shall be made available to the APCD upon request.[*Reference: APCD Rule 1303.D.1.f, 40 CFR 70.6(a)(3)*]

- (1) **Fuel Use:** Records documenting the volume (scf) of natural gas consumed each month by boiler. [*Reference: APCD Rule 342.1.1*]
- (2) **Fuel Heating Value**: Monthly records documenting the higher heating value of the natural gas fuel. Such documents shall be either the results of the laboratory analyses using ASTM test methods prescribed in Rule 342 or other test analyses data which have prior written APCD approval. [Reference: APCD Rule 342.1.1]
- (3) **Annual Tune-Up Records**: Documentation verifying the required annual tune-ups for each boiler. [*Reference: APCD Rule 342.1.3*]

9.3.E Reporting [Reference: 40 CFR 70.6(a)(3)(iii)]

- (1) Annual Reporting By March 1 of each year, a report detailing the previous calendar year's activities shall be provided to the APCD by the permittee. The report shall list all generated pursuant to the Recordkeeping conditions 9.3.4(1)(a) through (c) of this permit listed above.[Reference: SoCalGas ATC 8l66, 40 CFR 70.6(a)(3)(iii)]
- (2) **Electronic Submittal of Data** The permittee may, with prior approval from the APCD, submit the report on a computer disk instead of a hard copy medium. The APCD will specify the format for such disk reporting. [Reference: APCD Rule 1303]

Page 62 of 88 Pages

9.4 Conditions for Permitted Thermal Oxidizers At La Goleta

Table 9.4.1 Equipment List & Applicable Prohibitory/Breakdown Rules and NSR Conditions for thermal oxidizers (TOs).

'TO' ID#	EQUIPMENT	Rule 301	Rule 302	Rule 303	Rule 305	Rule 309	Rule 311	Rule 359	Rule 505	BACT/ Offset	Other Req.
#3	Thermal Oxidizer, 1.6 MMBtu/hr capacity; pilot w/ natural gas.	√	√	√	✓	√	√	√	✓		APCD ATC #8166
#4	Thermal Oxidizer, 1.6 MMBtu/hr capacity; pilot w/ natural gas.	√	√	√	✓	√	√	√	✓		APCD ATC #8166
#5	Thermal Oxidizer, 1.6 MMBtu/hr capacity; pilot w/ natural gas.	√	✓	✓	→	✓	√	√	→		APCD ATC # 8166

The generic emission limits applicable to the three enclosed thermal oxidizers (TOs) listed in Table 9.4.1 are tabulated below in a summary format, for convenience.

Table 9.4.2 Applicable generic emission limits/standards for TOs — Summary

Applicable Requirement	Permit Cond.# 9.4.A	Pollutant/Parameter	Limits/Standards ¹	Monitoring Method	MTRG ² Cond. § 9.4.
APCD Rule 301	(1)	All pollutants	No circumvention of any mass concentration limits through effluent stream dilution	Annual APCD Source Inspection	Comply w/other cond. in PTO
APCD Rule 302.B	(3)(a)	PM/Visible Emissions	20% opacity, not to be exceeded over 3 minutes in any one hour	Human Observer	A.(3)(a)
APCD Rule 303	(2)	Air Contaminants	No nuisance: no endangering of health, safety comfort nor damage to any property/business	Maintaining a complaint log onsite.	A. (2)
APCD Rule 305	(3)(b)	PM	0.19 0.20 gr./dscf	Choice of fuel use	A.(3)(b)
APCD Rule 309.A.1	(4)(a)	SO2	2,000 ppmv	Fuel S content	A.(4)(a)
APCD Rule 309.A.2	(3)(b)	PM	0.1 gr./dscf @ 12% CO2	Choice of fuel use	A.(3)(b)
APCD Rule 311.B	(4)(b)	SO2	15 gr. as H2S/100 cu.ft of gaseous fuel	Fuel S Content	A.(4)(a)

Table Note: 1 -- Requirement summarized; refer to APCD Rule § listed in Column 1 for full text. 2 -- "MTRG" stands for Monitoring.

9.4.A Generic Emission/Operation Limits For Thermal Oxidizers (To) [Reference: 40 CFR 70.6(a)(1)]

- (1) **Circumvention** No emissions shall be concealed using diluent air or without any actual required pollution reduction [*Reference: APCD Rule 301*].
- (2) **Nuisance** No pollutant emissions from any thermal oxidizer (TO) shall create nuisance conditions off-site [*Reference: APCD Rule 303*]; complaint logs shall be maintained on-site to record any nuisance complaint reported to the APCD which requires SoCalGas mitigation action.

 APCD Regulatory Compliance Manual (Sec.IV) lists nuisance enforcement measures
- (3) Particulate Emissions Particulate emissions from TOs shall not exceed the following limits:
 - (a) **Opacity:** A plume opacity, as dark or darker in shade or obscuring an observer's view to a degree equal to or greater than smoke designated as No. 1 on the Ringelmann Chart (as published

Page 63 of 88 Pages

by the US Bureau of Mines), for a period or periods aggregating more than three minutes in any one hour [*Reference: APCD Rule 302.B*]. Compliance with this condition is automatically met as long as the pilots are fired with natural gas (uncontrolled PM₁₀ emission factor equivalent to 0.007 gr./dscf), and the TOs comply with the Rule 359.D.2.a "smokeless" opacity standards.

(b) **Mass Emissions Rate:** 0.1 grains per dry standard cubic foot, corrected to 12% CO2 at standard conditions of 60°F and 29.92 inches of mercury [*Reference: APCD Rule 309.A.2.b*]. Compliance with this condition is automatically met as long as the TOs combust gaseous fuel

(4) SO₂ Emissions — SO₂ emissions from any TO shall not exceed the following limits:

(a) ppmv SO₂: 2,000 ppmv concentration of sulfur compounds, calculated as sulfur dioxide, at the point of discharge into ambient atmosphere [Reference: APCD Rule 309.A.1]. Compliance with this condition is automatically met as long as the TOs are fired with PUC quality natural gas (currently containing less than 4 ppmv of H₂S and 80 ppmv of total sulfur compounds]or similar fuel.

(b) ppmv H₂S: The gaseous fuel shall not contain sulfur compounds in excess of 15 gr./100 cubic feet (or, 238 ppmv), calculated as H₂S at standard conditions [Reference: APCD Rule 311.B]. Compliance with this condition is met as long as the TOs are fired with PUC quality natural gas or similar fuel.

Table 9.4.3 Applicable Unit-Specific Emission Limits/Standards for TOs — Summary

(uncontrolled PM10 emission factor equivalent to 0.01 gr./dscf max.).

"TO" ID #	Applicable Requirement	Permit Cond. # 9.4.B	Limit/Standard ¹	Monitoring Method	MTRG ² Cond # 9.4.C
			Pollutant: NOx		
ID #'s 3,4 and 5	PTO 9275 - Table 1	(1)	0.16 lb/hr, 3.84 lbs/day and) 0.55 ton/yr for each TO	Tune-up data and fuel use	(2)(a)(c)
			Pollutant : VOC (ROC)		
ID #'s 3,4 and 5	PTO 9275 - Table 1	(1)	0.01 lb/hr, 0.24 lb/day and 0.03 ton/yr for each TO	Annual fuel use	(2)(a)(c)
			Pollutant : CO		
ID #'s 3,4 and 5	PTO 9275 - Table 1	(1)	0.03 lb/hr, 0.72 lb/day and 0.11 ton/yr. for each TO	Tune-up data and fuel use	(2)(a)(c)

Page 64 of 88 Pages

SoCalGas: La Goleta Plant

Table Note: 1 -- Requirement summarized; refer to APCD Rule § listed in Column 2 for full text. 2 -- "MTRG" stands for Monitoring

Table 9.4.3 Applicable Unit-Specific Emission Limits/Standards for thermal oxidizers — Summary

"TO" ID #	Applicable Requirement		Limit/Standard ¹	Monitoring Method	MTRG ² Cond # 9.4.C
			Pollutant : SO2		
ID #'s 3,4	PTO 9275 - Table 1	(1)	0.84 lb/hr, 20.16 lbs/day and	Fuel S content and annual	(2)(a)(c)
and 5			0.07 ton/yr for each TO	fuel use	
			Pollutant : PM 10		
ID #'s 3,4	PTO 9275 - Table 1	(1)	0.01 lb/hr, 0.24 lb/day and 0.03	Annual fuel use	(2)(a)(c)
and 5		. ,	ton/yr. for each TO		

Table Note: 1 -- Requirement summarized; refer to APCD Rule § listed in Column 2 for full text. 2 -- "MTRG" stands for Monitoring.

9.4.B Unit-Specific Emissions/Operations Limitation. [Reference: 40 CFR 70.6(a)(1)]

- (1) Emission Limits Specific pollutant emissions (mass emissions rate) from each TO listed in Table 9.4.1 shall not exceed the emission limits specified for it in Table 9.4.3 unless an USEPA-approved exemption to do so is obtained under Rule 505 listed in Table 9.4.1. The limits in Table 9.4.3 do not supersede any other limits that may be specified for the equipment by any applicable requirement promulgated by the USEPA or the APCD during the life of this permit. Compliance with this condition shall be based on annual reports on the gas volume combusted along with the total sulfur content and high heating value data (HHV) for the combusted gases.
- (2) **Operational Limits** The operational limits listed below shall apply to all the TOs listed in this section (i.e., Section 9.4). Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit.
 - (a) **Smokeless Operation:** Each TO shall operate "smokeless," as defined in APCD Rule 359.C.[*Reference: APCD Rule 359.D.2.a*]
 - (b) **Automatic Ignition**: The TO outlet shall operate equipped with an automatic ignition system including a pilot-light gas source or equivalent system, or shall operate with a pilot flame present at all times with the exception of purge periods for automatic ignition equipped TOs. [*Reference: APCD Rule 359.D.2.b.1*)]
 - (c) **Flame Monitoring**: The presence of the flame in the TO pilot shall be continuously monitored using a thermocouple or an equivalent device that detects the presence of a flame. [*Reference: APCD Rule 359.D.2.b.2*)]
 - (d) **Flame Operation**: The flame shall be operating at all times when combustible gases are vented through the TOs. [*Reference: APCD Rule 359.D.2.b.3*)]
 - (e) **Gas For Purging**: TOs which use flow-sensing automatic ignition systems and not continuous flame pilots shall use inert gas (e.g., nitrogen) or PUC quality gas for purging. [*Reference: APCD Rule 359 D.5.a*]
 - (f) **Heat Input:** Based on the design rating of the thermal oxidizer submitted by SoCalGas in its permit application, the maximum hourly heat input (in units of MMBtu/hr) to each TO is limited to the value listed below:

Page 65 of 88 Pages

SoCalGas: La Goleta Plant

<u>'TO' ID#</u>

<u>Max. Hourly Heat Input</u>
(MMBtu/hr)

3,4 and 5

1.60 (each 'TO')

(g) **Sulfur Limit:** The following combustion and fuel gas sulfur limits apply:

- (1) **Combustion Gases** The gases combusted in the TOs shall not contain sulfur compounds in excess of 15 gr./100 scf (239 ppmvd), calculated as H2S under standard conditions (i.e., 14.7 psia and 60°F). [*Reference: APCD Rule 359.D.1.a*]
- (2) Pilot Fuel Gas Only natural gas shall be used as pilot fuel gas.

9.4.C Unit-Specific Compliance Monitoring [Reference: 40 CFR 70.6(a)(3)(1)]

Summary Tables For Compliance Tracking Requirements:

EU: Thermal Oxidizers: Applicable Federal Requirement: APCD Rule 359

	<u> </u>
METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	Also, the gaseous fuel sulfur content and the net heating value for all gaseous fuel shall be measured annually, or more frequently if required by compliance assurance monitoring rules.
RECORD KEEPING	Recordkeeping shall follow those listed in any federally-enforceable permits issued to the source. All records shall be kept for five (5) years for Part 70 sources, and shall be made available to the APCD upon request.
REPORTING	Reporting shall follow those listed in any federally-enforceable permits issued to the source.
TEST METHODS	The heating value for the gaseous fuel shall be determined by the following test method: ASTM D 4891-89, or ASTM D 1945-81 or ASTM D 1946-90. The total reduced sulfur in the gaseous fuel shall be measured using the USEPA Reference Method 16 (GCFPD analysis) or 16A or BAAQMD St-21

comments:

EU: Thermal Oxidizers; Applicable Federal Requirement: APCD Rule 309

ZCV THETHIAI OMIGIZETS,	inplicable i ederal itequirement.
METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	As required by any federally-enforceable permits (e.g., ATCs issued prior to 8/79) issued by the APCD to the source or any APCD-approved compliance monitoring plan. The following apply: SO_2/PM_{10} emissions monitoring not required when using PUC-quality gas as fuel, since the source meets the rule standards presumptively.
REPORTING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
RECORDKEEPING	As required by any federally-enforceable permits or plans issued by the APCD to the source.
TEST METHODS	As stipulated in any federally-enforceable permits or plans issued by the APCD to the source.

comments:

- (1) **Source Testing** The TOs listed in Table 9.4.1 of this permit are not subject to any source testing requirements [*Reference: APCD Rule 359.B.3*]
- (2) **Periodic Monitoring** For each TO listed in Table 9.4.1 of this permit:
 - (a) **Heating Value**: The heating value of the gaseous fuel (Btu/scf) shall be analyzed annually using the ASTM methods listed in Rule 359.E (test methods) [*Reference: APCD Rule 359.F.2*]

Page 66 of 88 Pages

SoCalGas: La Goleta Plant

(b) **Fuel Sulfur Content**: The gaseous fuel sulfur content must be measured annually using the ASTM methods listed in Rule 359.E (test methods) [*Reference: APCD Rule 359.F.2*]

(c) **Purge Gas Sulfur Content:** The purge gas fuel sulfur content must be measured annually using Rule 359.E-listed ASTM methods, if such gas is not PUC quality natural gas [*Reference: APCD Rule 359.F.2*]

9.4.D RECORDKEEPING [Reference: 40 CFR 70.6(a)(3)(ii)]

The records listed below shall be maintained, for a minimum of five (5) years, by the permittee and shall be made available to the APCD upon request.[Reference: APCD Rule 1303.D.1.f, 40 CFR 70.6(a)(3)]

- (1) **Heating Value**: Annual records documenting the higher heating value of the natural gas fuel. Such documents shall be the results of the laboratory analyses using ASTM test methods prescribed in Rule 359.E [Reference: APCD Rule 359.F.2]
- (2) **Fuel Sulfur Content**: Records documenting annually the gaseous fuel sulfur content and, if applicable, the purge gas fuel sulfur content for each thermal oxidizer [*Reference: APCD Rule 359.F.2*]

9.4.E REPORTING [Reference: 40 CFR 70.6(a)(3)(iii)]

- (1) Annual Report By March 1 of each year, a report detailing the previous calendar year's activities shall be provided to the APCD by the permittee. The report shall list all data generated pursuant to the Recordkeeping conditions 9.4.4 (a) and (b) of this permit listed above.[Reference: SoCalGas ATC 8l66, 40 CFR 70.6(a)(3)(iii)]
- (2) **Electronic Submittal of Data** The permittee may, with prior approval from the APCD, submit the report on a computer disk instead of a hard copy medium. The APCD will specify the format for such disk reporting. [Reference: APCD Rule 1303]

Page 67 of 88 Pages

9.5 Conditions for Permitted Automotive Refueling Facility At La Goleta

Table 9.5.1 Equipment List & Applicable Prohibitory/Breakdown Rules & NSR conditions for the Refueling Facility

ID#	EQUIPMENT	Rule 301	Rule 303	Rule 315	Rule 316	Rule 317	CARB EEO #G- 70-97-A	CARB EEO #G- 70-17-AB	Rule 505	APCD Reg. II
1	Underground Gasoline storage tank, one (1), 12,000 gal. capacity	1	1	√	1	√	√	√	√	1
2.	Phase I vapor recovery, OPW Two Point System	1	1	1	1	√	1	$\sqrt{}$	√	$\sqrt{}$
3.	One (1) gasoline dispensing cabinet with one (1) gasoline dispensing nozzle	1	1	1	1	√	√	√	√	1
4.	Phase II vapor recovery, EMCO Wheaton Balance system	1	1	1	1	1	√	√	√	V

Table 9.5.2 Applicable generic emission limits & standards for Refueling Facility— Summary

Applicable Requirement	Permit Cond. # 9.5.A	Pollutant/Paramet er	Limits/Standards ¹	Monitoring Method	MTRG ² Cond. § 9.5.
APCD Rule 301	(1)	All pollutants	No circumvention of any mass concentration limits through effluent stream dilution	Annual Source Inspection	Comply w/other PTO cond.
APCD Rule 303	(2)	Air Contaminants	No nuisance: also endangering of health, safety comfort; nor cause damage to any property.	Maintaining a complaint log on-site.	A.(2)

Table Notes: 1 -- Requirement summarized; refer to APCD Rule and Section § listed in Column 1 for full text. 2 -- "MTRG" stands for Monitoring.

9.5.A Generic Emission/Operation Limits For Refueling Facilities [Reference: 40 CFR 70.6(a)(1)]

- (1) **Circumvention** No emission shall be concealed using diluent air or without any actual required pollution reduction [*Reference: APCD Rule 301*].
- (2) **Nuisance** No pollutant emissions from any IC engine shall create nuisance conditions off-site [*Reference: APCD Rule 303*]; complaint logs shall be maintained on-site to record any nuisance complaint reported to the APCD which requires SoCalGas mitigation action.

APCD's Regulatory Compliance Manual, Section IV, lists nuisance enforcement measures.

Page 68 of 88 Pages

Table 9.5.3 Applicable Unit-Specific Emission Limits/Standards for Refueling Facilities — Summary

Unit. ID#	Applicable Requirement	Permit Cond. # 9.5.B	Limit/Standard ¹	Monitoring Method	MTRG ² Cond. # 9.5.C
			Pollutant: VOC (ROC)		
2,3,4	Rule 316. C.1,2,3,4, and G	(2)(iii)	Gasoline dispensers must be equipped with Phase I & II vapor recovery units; tank must be equipped with a submerged fill pipe	Vapor loss control device inspection (also see Sec. 9.5(c)	(2)(a)(e)
	PTO 6819, Table 1	(1)	3.81 lbs/hr and 0.04 t/yr.	Recordkeeping & annual reporting	(2)(a)(e)

9.5.B Unit-Specific Emissions/Operations Limitation. [Reference: 40 CFR 70.6 (a)(1)]

- (1) Emission Limits Aggregated VOC emissions from the emission units listed in Table 9.5.1 shall not exceed either 3.81 lbs/hr and 0.04 ton/yr or specified for these units by any applicable requirement listed in Table 9.5.1 [Reference: APCD Rule 316, SoCalGas PTO 6819]
- (2) **Operational Limits** The following operational limits shall apply to the refueling facility units listed in Table 9.5.1:
 - (a) **Gasoline Throughput Limits**: The overall gasoline throughput shall not exceed 3500 gallons per month. [*Reference: SoCalGas PTO 6819*]
 - (b) **Vapor Recovery System Maintenance**: Any component of the vapor recovery system which is defective shall be removed from service until it is repaired, replaced or adjusted as necessary. [*Reference: APCD Rule 316, SoCalGas PTO 6819*]
 - (c) **Gauging/Sampling**: Gauging and/or sampling devices on the tanks shall be equipped with gastight covers which shall be closed at all times except during gauging or sampling. [*Reference: APCD Rule 316, SoCalGas PTO 6819*]
 - (d) **Equipment Maintenance:** The equipment shall be properly maintained and kept in good condition at all times. [*Reference: APCD Rule 316, SoCalGas PTO 6819*]
 - (e) **Permit Posting:** A copy of APCD PTO 6819 shall be posted or kept readily available at the refueling facility at SoCalGas. [Reference: APCD Rule 201.E]
 - (f) **Permit Renewal:** APCD PTO 6819 is subject to renewal upon change of equipment owner or operator. [*Reference: APCD Rule 203*]

Page 69 of 88 Pages

9.5.C Unit-Specific Compliance Monitoring [Reference: 40 CFR 70.6(a)(3)(1)]

Summary Tables For Compliance Tracking Requirements

EU: Storage & Transfer of Gasoline; Applicable Federal Requirement: APCD Rule 316

METHOD	DESCRIPTION OR REFERENCE METHOD
MONITORING	Monitoring of Phase I & Phase II vapor recovery units, as listed in the federally-enforceable permit.
RECORD KEEPING	Recordkeeping shall follow those listed in the federally-enforceable permit issued to the source. All records shall be kept for five (5) years and shall be made available upon request.
REPORTING	Reporting shall follow those listed in any federally-enforceable permits issued to the source.
TEST	CARB Test Method 2-6.
METHODS	

comments:

- (1) **Source Testing** The refueling facility equipment listed in Table 9.5.1 of this permit are subject to any source testing requirements.
- (2). **Periodic Monitoring** SoCalGas will monitor the operation of Phase I and Phase II vapor recovery units per Condition 9.5.2.(e) {*Equipment Maintenance*} of this permit section.
- 9.5.D RECORDKEEPING [Reference: 40 CFR 70.6(a)(3)(ii)]

The records listed below shall be maintained, for a minimum of five (5) years, by SoCalGas and shall be made available upon request. [Reference: APCD Rule 1303.D.1.f]

- (1) Gasoline Throughput The gasoline throughput per month.[Reference: APCD PTO 6819]
- (2) **Gasoline Supply** The names of the gasoline suppliers. [Reference: APCD PTO 6819]
- 9.5.E REPORTING [Reference: 40 CFR 70.6(a)(3)(iii)]

Annual Reporting — By March 1 of each year, a report detailing the previous calendar year's activities shall be provided by SoCalGas to the APCD (Attn.: RCD Annual Report Coordinator). The report shall list the names of the gasoline suppliers and the gross monthly gasoline throughputs. [Reference: SoCalGas PTO 6819, 40 CFR 70.6(a)(3)(iii)]

Page 70 of 88 Pages

9.6 Other "Permit-Exempt" But "APCD-Only" Regulated Emission Units At La Goleta Stationary Source

Note: The table below lists **insignificant** "**emissions units**" at the SoCalGas La Goleta stationary source as listed by the permittee in the Part 70 permit application, Form 1302-H (Exempt Units). The table is printed here for informational purposes only, for the permittee and the APCD compliance staff. **Operation of any of these emissions units is not regulated under this permit**.

Table 9.6 List¹ of relevant APCD Prohibitory Rules **enforceable by APCD-only** for "permit exempt" emission units at La Goleta stationary source [*Table for Informational Purposes Only*]

EQUIPMENT	Rule 301	Rule 302	Rule 303	Rule 305	Rule 309	Rule 310	Rule 311	Rule 317	Rule 321	Rule 323	Rule 324	Rule 505	APCD Reg. II
Two (2) diesel fuel storage tanks, less than 10,000 gallons capacity.	1		1									1	V
Two (2) diesel-fired IC engines - Cummins, Model V-378-F2 - 133 hp; to power emergency fire water pumps.	1	1	1	1	√		√					√	1
One (1) gas-fired IC engine - Waukesha, F817GU, 160 hp; to provide emergency electrical power.	1	1	1	1	√		7					7	1
One (1) lubrication oil storage tank, for storing used crankcase lube oil.			1								√	7	1
Glycol storage tanks; to store ethylene glycol used in closed-loop dehydration process.			1			√					1	7	1
Safe-T-Kleen unit; Model 30; remote reservoir cold solvent cleaner			√						√		√	√	1
Wipe cleaning; facility-wide, mainly for equipmt.maintenance; also to clean structures.			1					1	1		√	1	1
Surface coating: facility-wide, for equipment maintenance and for structural coating.			1							1		1	1

Page 71 of 88 Pages

SoCalGas: La Goleta Plant

Table Note 1 — This informational list does not include "all" relevant "APCD-only enforceable" rules

9.7. Standard Administrative Conditions

9.7.A Federally-Enforceable Administrative Conditions

The following federally enforceable **administrative** permit conditions apply to SoCalGas La Goleta stationary source.

(1). Compliance with Permit Conditions —

- (a). The permittee shall comply with all permit conditions [Reference: APCD Rule 1302.D.1.j]
- (b). This permit does not convey property rights or exclusive privilege of any sort [Reference: APCD Rule 1302.D.1.n]
- (c). Non-compliance with any permit condition is grounds for permit termination, revocation and reissuance, modification, enforcement action, or denial of permit renewal [Reference: APCD Rule 1302.D.1.l);
- (d). The permittee shall not use the "need to halt or reduce a permitted activity in order to maintain compliance" as a defense for noncompliance with any permit condition [Reference: APCD Rule 1303.D.1.k);
- (e). A pending permit action or notification of anticipated noncompliance does not stay any permit condition [Reference: 40 CFR Part 70.5.(a)(6)(iii)]
- (f). Within a reasonable time period, the permittee shall furnish any information requested by the air pollution control officer (APCO), in writing, for the purpose of determining: [Reference: APCD Rule 1302.D.1.o]
 - (1) compliance with the permit, or
- (ii) whether or not cause exists to modify, revoke and reissue, or terminate a permit or for an enforcement action.

(2). Emergency Provisions —

The permittee shall comply with the requirements of the APCD, Rule 505 (Upset/Breakdown rule) and/or APCD Rule 1303.F, whichever is applicable to the emergency situation [Reference: APCD Rule 1303.F]

(3). Compliance Plan —

- (a). The Compliance Plans for the stationary source, submitted by the permittee on application Forms 1302-I (1 & 2) and 1302-J (1 & 2), are a part of this Part 70 permit. [Reference: APCD Rule 1302.D.2]
- (b). The permittee will continue to comply with those requirements with which it is in compliance, as identified in the Compliance Plans.
- (c). The permittee shall comply with all federally enforceable requirements that become applicable during the permit term, in a timely manner, as identified in the Compliance Plan

Page 72 of 88 Pages

(d). For all applicable equipment, the permittee shall implement and comply with any specific compliance plan required under any federally-enforceable rules or standards.

(4). Right of Entry_—

The Regional Administrator of USEPA, the APCO, or their authorized representatives, upon the presentation of credentials, shall be permitted to enter upon the premises: [Reference: APCD Rule 1303.D.2.a]

- (a). To inspect the stationary source, including equipment, work practices, operations, and emission-related activity; and
- (b). To inspect and duplicate records required by this Permit to Operate at reasonable times; and
- (c). To sample substances or monitor emissions from the source or assess other parameters to assure compliance with the permit or applicable requirements, at reasonable times. Monitoring of emissions can include source testing.

(5). Severability —

The provisions of this Permit to Operate are severable and if any provision of this Permit to Operate is held invalid, the remainder of this Permit to Operate shall not be affected thereby. [Reference: APCD Rule 1303.D.1.i]

(6). Permit Life —

This Permit to Operate shall become invalid five years from the date of issuance unless a timely and complete renewal application is submitted to the APCD. Any operation of the Part 70 source to which this permit is issued beyond the expiration date of this permit and without a valid operating permit (or a complete permit renewal application) shall be a violation of the CAAA, § 502(a) and 503(d) and of the APCD rules [Reference: APCD Rule 1303.D.1.c,d]

The permittee shall apply for renewal of this permit earlier than 6 months but later than 12 months before the date of its expiration. Upon submittal of a timely and complete renewal application, this permit to operate shall remain in effect until the APCO issues or denies the renewal application [Reference: APCD Rule 1304.D.1.a.v]

(7). Payment of fees—

The permittee shall reimburse the APCD for all its Part 70 permit processing and compliance monitoring expenses for the stationary source on a timely basis. Failure to reimburse on a timely basis shall be a violation of this permit and of applicable requirements and can result in forfeiture of this Permit to Operate. Operation without a permit to operate subjects the source to potential enforcement action by the APCD and the USEPA pursuant to section 502(a) of the Clean Air Act. [Reference: APCD Rules 1303.D.1.p, 1304.D.11 and 40 CFR 70.6(a)(7)]

(8). Deviation from Permit Requirements—

The permittee shall report any deviation from requirements in this Permit to Operate, other than deviations reported to the APCD pursuant to the APCD Upset/Breakdown Rule 505, or the Part 70 Emergency Breakdown Rule 1303.F, to the APCO within 7 days of the occurrence of the deviation. rbara County APCD

Page 73 of 88 Pages

SoCalGas: La Goleta Plant

Santa Barbara County APCD FINAL Part 70 Permit 9584 - 01 Permit Expires on 1/12/03 The permittee shall use APCD approved forms to report any such deviations such as operation of permitted or n-listed emission units which increases the stationary source's potential to emit [Reference: APCD Rule 1303.D.1.g, 40 CFR 70.6(a)(3)(iii)(B)]

(9). Federally-enforceable Conditions —

Each federally enforceable condition in this permit shall be enforceable by the USEPA and members of the public. None of the conditions in the APCD-only enforceable section of this permit are federally enforceable or subject to the public/USEPA review [Reference: CAAA, § 502(b)(6), 40 CFR 70.6(b)]

(10). Compliance —

No terms or conditions contained in this permit shall be construed to allow the violation of any local, State or Federal Rule, regulation, ambient air quality standard or air quality increment. [Reference: APCD Rule 206]

(11). Condition Acceptance —

Acceptance of this operating permit by SoCalGas shall be considered as acceptance of all terms, conditions, and limits stated in this permit. [Reference: APCD Rule 206]

(12). Reporting Requirements —

(a). Monitoring Report_: [Reference: APCD Rule 1303.D.1.g]

The permittee shall submit a written monitoring report which <u>summarizes</u> monitoring data for the reporting period and reports all deviations from permit requirements, including deviations attributable to upset conditions, to the APCO every six months. The reporting periods shall be: each half of the calendar year, e.g., January to June for the first half of the year. These reports shall be submitted within 30 days of the end of each six month (submittal period). All reports of a deviation from permit requirements shall include the probable cause of the deviation and any preventative or corrective action taken

The permittee shall use APCD approved forms for the report regarding deviation from permit requirements and shall also include a written statement from the responsible official which certifies the truth, accuracy, and completeness of the report. When deviations have occurred for the reporting period, such information shall be stated in the report.

(b). Compliance Certification Report: [Reference: APCD Rule 1302.D.3, 1303.2.c.]

The permittee shall submit compliance certification reports to the USEPA and the APCO annually assessing the stationary source's compliance with its permit conditions for the preceding four calendar quarters. These reports shall be submitted on March 1 of each year and will contain all compliance information, summarized, for the previous calendar year period. The permittee shall use APCD approved forms for the compliance certification and shall also include a written statement from the responsible official which certifies the truth, accuracy, and completeness of the report

(13). Recordkeeping Requirements — [Reference: APCD Rule 1303.D.1.f]

Records of all monitoring and support information shall include the following:

Santa Barbara County APCD

Page 74 of 88 Pages

FINAL Part 70 Permit 9584 - 01

SoCalGas: La Goleta Plant

Permit Expires on 1/12/03

- (a). date, place, and time of measurement or maintenance activity;
- (b). operating conditions at the time of measurement or maintenance activity;
- (c). date, place, name of company or entity that performed the measurement or maintenance activity and the methods used; and
- (d). results of the measurement or maintenance.

The monitoring and support information shall be retained for at least <u>five years</u> from date of initial entry.

(14). Conditions for Permit Reopening —

The permit shall be reopened and revised for cause under any of the following circumstances:

- (a) **Additional Requirements**: If additional applicable requirements, e.g., NSPS or MACT, become applicable to the Part 70 source *which has an unexpired permit term of three (3) or more years*, the permit shall be reopened. Such a reopening shall be completed later than 18 months after promulgation of the applicable requirement. However, no such reopening is required if the effective date of the requirement is later than the date on which the permit is due to expire, unless the original permit or any of its terms and conditions has been extended. For example, when the original permit or any of its terms and conditions is eligible for a permit shield, and has been extended because of renewal application review, the permit will be reopened. All such reopenings shall be initiated only after a 30 day notice of intent to reopen the permit has been provided to the permittee, except that a shorter notice may be given in case of an emergency.[*Reference: 40 CFR 70.7(f)(1)-(3)*]
- (b) **Inaccurate Permit Provisions**: If the APCD or the USEPA determines that the permit contains a material mistake or that inaccurate statements were made in establishing the emission standards or other terms or conditions of the permit, the permit shall be reopened. Such reopenings shall be made as soon as practicable. [*Reference: 40 CFR 70.7(f)(1)(1) and (f)(2)*]
- (c) **Applicable Requirement**: If the APCD or the USEPA determines that the permit must be revised or revoked to assure compliance with any applicable requirement including a federally enforceable requirement, the permit shall be reopened. Such reopenings shall be made as soon as practicable. [Reference: $40 \ CFR \ 70.7(f)(1)(iv) \ and \ (f)(2)$]

Administrative procedures to reopen and revise/revoke/reissue a permit shall follow the same procedures as apply to *initial permit issuance*. Reopenings shall affect only those parts of the permit for which cause to reopen exists. [Reference: $40 \ CFR \ 70.7(f)(1)(1)$ and (f)(2)]

If a permit is reopened, the expiration date does not change. Thus, if the permit is reopened, and revised, then it will be reissued *with the old expiration date* [Reference: 40 CFR 70.6(a)(2)]

(15). Application of More Stringent Rule —

Where a federally enforceable requirement, e.g., NSPS, NESHAP, BACT/LAER, MACT, and an APCD requirement apply to the same emissions unit but are mutually exclusive, each requiring different pollution control technology, the more stringent requirements shall apply. Thus, if the terms in the APCD's USEPA-approved ATC or the SIP-based conditions in the APCD's PTO are more stringent than the federal requirements, then the APCD permit conditions shall be incorporated as a

Page 75 of 88 Pages

Part 70 permit condition (the other requirements can be referenced or subsumed and permitshielded). [Reference: APCD Rule 1303.D.1.s]

<u>USEPA Note (reference: letter dated 4/11/95) for Resolving Mutually Exclusive Requirements</u> -Two applicable requirements (one federal and the other APCD's) may be considered mutually exclusive only if they cant be met at the same time. In situations where two requirements are truly mutually exclusive, it may be difficult to identify the more stringent requirement. *Therefore, permit applications that identify two applicable requirements as being mutually exclusive should be reviewed by both the APCD and the USEPA.*

Page 76 of 88 Pages

9.7.B <u>"APCD-Only" Enforceable Administrative Conditions</u>

The following permit conditions are enforceable only by the APCD and the California Air Resources Board staff:

- (1). **Grounds for Revocation** Failure to abide by and faithfully comply with this permit shall constitute grounds for revocation pursuant to California Health & Safety Code Section 42307 et sea.
- (2). **Defense of Permit** SoCalGas agrees, as a condition of the issuance and use of this permit, to defend at its sole expense any action brought against the APCD because of the issuance of this permit. SoCalGas will reimburse the APCD for any and all costs including, but t limited to, court costs and attorney's fees which the APCD may be required by a court to pay as a result of such action. The APCD may, at its sole discretion, participate in the defense of any such action, but such participation will not relieve SoCalGas of its obligation under this condition. The APCD will bear its own expenses for its participation in the action.
- (3). Consistency with Analysis. Operation under this permit shall be conducted consistent with all data, specifications and assumptions included in the APCD's analyses under which this permit is issued.
- (4). **Consistency with State and Local Permits.** nothing in this permit shall relax any applicable air pollution control requirements or mitigation requirements imposed on SoCalGas by any other State or local regulatory agencies such as the County Agencies implementing Land Use or Project Development regulations.
- (5). **Emergency Episode Plan.** Twelve (12) months prior to each scheduled federal operating permit renewal date, SoCalGas shall review and update its Emergency Episode Plan for the stationary source and submit it for APCD approval.
- (6). **Emergency IC Engine Use.** The emergency IC engine driving the fire water pump, shall only be operated for testing or emergency purposes more than 199 hours per calendar year. SoCalGas shall install, operate and properly maintain a dedicated, non-resettable elapsed time meter on the engine. SoCalGas shall record in a log the following: the number of operating hours on each day the engine is operated, and the cumulative total of monthly and annual hours.

Page 77 of 88 Pages

SoCalGas: La Goleta Plant

(7). **Enforceable Conditions from Other APCD Permits.** The following conditions are also enforceable by the APCD only:

All permit conditions in APCD-PTOs — 6819, 7500, 8008, 8166, 8946, 9075, 9162 and 9275, not listed in Sections 9.1 - 9.5 of this document will be enforced by the APCD, unless deleted in Table 3.1 as not relevant to SoCalGas operations any more.

Specifically, the following operational conditions are APCD-enforceable only:

- (a) Emission Reduction Credits Dedicated To Point Arguello Project: The emission reduction credits created by APCD PTO 7500 are offsets for use by Chevron USA, Inc., to meet the offset requirements for its Point Arguello Project. Emission reduction measures implemented to create the above emission reductions shall be maintained according to the "PTO 7500 IC Engine Compliance Plan (IC Engine Compliance Plan)." The emission reduction credits are valid for the life of the Point Arguello Project. The APCD permit does not authorize the dedication of these emission reductions to any other project without prior approval of the APCD. The APCD will evaluate and assess any such proposal in accordance with rules and regulations in effect at the time an application for such other project is deemed complete or at a later date if provided for by the APCD Rules.
- (b) **Shifts In Load**: To assure that offsets in APCD PTO 7500 are real, quantifiable, surplus and enforceable, SoCalGas shall not utilize a shift in load from the controlled engines with ID #'s 2 8 to other uncontrolled point sources at the stationary source as means of generating possible additional emission reduction credits (ERCs).

For the purposes of this condition, shift in load is defined as a redirecting of fuel from a controlled emission unit to an uncontrolled emission unit for the sole purpose of increasing the uncontrolled emission unit's baseline fuel usage resulting in the generation of false surplus ERCs. If such shift in load does occur, the increased emissions at the uncontrolled emission unit shall not be considered in any baseline calculation for possible ERC for that uncontrolled emission unit.

(c) **Equipment Operation And Maintenance** — Operation under all APCD PTOs shall be conducted in compliance with all data, specifications, references and assumptions included with the permit applications and supplements thereof (a copy to be made available to any person requesting it), and the attached APCD Engineering Evaluation under which this permit is issued. [*Reference: APCD 206*]

Page 78 of 88 Pages

The following conditions listed below for the dehydration/storage units, as listed in Table 9.7.B.1 also below, are enforceable by the APCD only:

Table 9.7.B.1 Equipment List & Applicable Prohibitory/Breakdown Rules and NSR Limits for Dehydration, Storage and Odorant Metering Units.

ID#	EQUIPMENT	Rule 301	Rule 303	Rule 310	Rule 326	Rule 323	Rule 346	Rule 505	Other Reg.
Dehydration Plant Unit #14:									•
#1	Underground gas storage wells , 21 in #								
#2	Gas/glycol contactors, three (3); Braun & Lacy; each 4.5' dia. by 37.8' long; with control tanks, three (3), each 16" dia. by 15' long.	√	√	✓				√	
#3	Gas/glycol contactor; Braun & Lacy; 4.5' dia. by 38.9' long; with a control tank 16" dia. by 15' long.	√	√	√				✓	
#4	Glycol/glycol heat exchangers, four (4); Griscom-Russel: each 5.25' tall by 23' long.	√	√	√				✓	
#5	Glycol/steam heat exchangers, two(2); Griscom-Russel: each 4.25' tall by 24' long.	√	√	√				✓	
#6	Glycol rectifier; Southwestern Engineering; 25" diameter.	√	√	✓				✓	
#7	Vapor Condensing coils; Happy Co.; 4.0' wide by 18' long.	√	✓	√				✓	
#8	Accumulator stack, closed and drip pot; Koenig; 0.67 feet dia. by 18' long.	✓	✓	✓				✓	
#9	Glycol particulate filters, two (2); Rol-Pak; each 1.7' dia. by 4' long	✓	√	√				✓	
#10	Glycol/gas separator; Southwest Welding; 4' dia. by 10.2' long	√	√	✓				✓	
#11	Glycol pumps, five (5), each driven by a 7.5 hp electric motor	√	✓	✓				√	
#12	Rectifier pumps, two (2), each driven by a 7.5 hp electric motor	√	✓	✓				✓	
#13	High pressure separator, V-100, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	√	✓	√				✓	ATC 9128
#14	Sand trap, V-200, welded construction, horizontal, 3' dia. by 19.8' long; connected to gas collection system.	✓	✓	✓				✓	ATC 9128
#15	Low pressure separator, V-101, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	✓	√	√				✓	ATC 9128
#16	Valves, flanges and other components in liquid and gas services emitting HCs	✓	✓	✓				✓	ATC 9128

Page 79 of 88 Pages

Table 9.7.B.1 Equipment List & Applicable Prohibitory/Breakdown Rules & NSR Conditions for Dehydration, Storage and Odorant Metering units (Cont.)

	Dehydration, Storage and Odorant Metering units (Cont.)									
ID#	EQUIPMENT	Rule 301	Rule 303	Rule 310	Rule	Rule 323	Rule 346	Rule	Other	
Dehvo	l dration Plant Unit # 14A:	301	303	310	326	323	340	505	Req.	
# 17	Gas/glycol contactors, two (2); Braun; 5.9' dia. by 35.6' long; with control tanks, two (2), 2' dia. by 15' long and 2' dia. by 17' long.	√	√	√				✓		
# 18	Glycol/gas separator; Southwest Welding; 5.5' dia. by 13.6' long	✓	√	✓				√		
# 19	Glycol particulate filters, four (4); Butane Tank Corp.; 0.75' dia. by 4' long.	✓	✓	✓				✓		
# 20	Glycol/glycol heat exchanger; Thermal Finned Tube Processor Inc.; 6.6' tall by 17.5' long.	✓	✓	✓				✓		
# 21	Glycol/steam superheaters, two (2); Brown; each 10' tall by 21' long.	✓	✓	✓				✓		
# 22	Glycol rectifier; Southwestern Eng.; 26" diameter.	✓	✓	✓				✓		
#23	Vapor condensing coils; Air-X-Changer; 0.67' wide by 7.3' long.	✓	✓	✓				✓		
#24	Accumulator stack, closed and drip pot; Koenig; 0.67' dia. by 18' long.	✓	✓	✓				✓		
# 25	Glycol pumps, three (3), each driven by a 7.5 hp electric motor.	✓	✓	✓				✓		
# 26	Glycol pump, driven by 15 hp electric motor.	✓	✓	✓				✓		
# 27	Rectifier pumps, two (2), each driven by a 7.5 hp electric motor	✓	✓	✓				✓		
# 28	High pressure separator, V-100A, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	✓	✓	✓				✓	ATC 9128	
# 29	Sand trap, V-200A, welded construction, horizontal, 3' dia. by 19.8' long; connected to gas collection system.	✓	✓	✓				✓	ATC 9128	
# 30	Low pressure separator, V-101A, welded construction, vertical, 3' dia. by 14.3' tall; connected to gas collection system.	✓	✓	✓				✓	ATC 9128	
#31	Valves, flanges and other components in liquid and gas services emitting HCs	✓	✓	✓				✓	ATC 9128	
Tank	Farm:									
# 32	Flotation cells, two (2), 10,000 gallons capacity each; 12' dia. by 12' height each.	✓	✓	✓				✓		
# 33	Hydrocarbon storage tank, 7,050 gal. capacity, 10' dia. by 12' height.	✓	✓	✓	✓			✓		
# 34	Brine water storage tank, 40,600 gal. capacity; 24' dia. by 12' height	✓	✓	✓				✓		
# 35	Condensate pump serving the storage tanks; 5 hp electric motor drive.	✓	✓	✓				✓		
# 36	Grade level loading station to load HC condensate to tanker trucks by motor driven pump; t equipped with VRU	√	√	√			✓	√		

Page 80 of 88 Pages

Table 9.7.B.1 Equipment List & Applicable Prohibitory/Breakdown Rules & NSR Conditions for Dehydration, Storage and Odorant Metering units (Cont.)

ID#	EQUIPMENT	Rule 301	Rule 303	Rule 310	Rule 326	Rule 323	Rule 346	Rule 505	Other Req.
Metha	anol Storage Tanks:								•
# 37	Methanol storage tanks, two (2), 500 gallons capacity each, pressurized with natural gas; with pressure relief valve.	√	√	√				√	
# 38	Pneumatic Pumps, two(2), serving the methanol tanks.	✓	√	✓				√	
Other	Equipment:								
# 39	Stack gas vents, for use in pipeline depressurizing operations.	✓	✓	✓				✓	
# 40	Piping, valves and flanges, not associated with other permitted equipment items but emitting fugitive hydrocarbons.	✓	✓	✓				✓	
Odora	ant/Metering Station # 14:								
# 41	Odorant storage tank, one (1) in ., designated as PV544: 2.2' dia. by 22.0' long; 568 gallons: relief valve set @ 15.0 psig, odorant Captan 50	✓	✓	✓				✓	
# 42	Odorant storage tank, one (1) in ., designated as PV597: 2.2' dia. by 13.5' long; 350 gallons: relief valve set @ 125 psig, odorant Captan 50	√	√	✓				✓	
# 43	Odorant run tank, one (1) in ., designated as PV1044C: 22" dia. by 4.7' long; 90 gal.: relief valve set @ 495 psig.	✓	✓	✓				✓	
# 44	Metering Pump, One (1) in ., Morgan: Model HD 562, S.N. 89-348A; operated on compressed air.	✓	✓	✓				√	
Odora	ant/Metering Station # 14A :								
# 45	Odorant storage tank, one (1) in ., designated as PV503: 3.6' dia. by 16.0' long; 1000 gallons: relief valve set @ 33 psig, odorant Captan 50	√	√	√				√	
# 46	Odorant run tank, one (1) in ., designated as PV610: 16" dia. by 4.2' long; 43 gal.: relief valve set @ 500 psig.	√	✓	✓				✓	
# 47	Metering Pump, One (1) in ., Morgan: Model HD 562, S.N. 89-348B; operated on compressed air.	✓	✓	✓				√	
Other	equipment at Stations 14 & 14A:								
# 48	Fugitive emission sources: flanges - 6; relief valves - 5; needle valves - 27; ball valves - 37; plug valves - 15; threaded fittings - 811.	✓	✓	✓				✓	

Table 9.7.B.2 Applicable Unit-Specific Emission Limits/Standards for Dehydration/Storage units — Summary

Unit. ID#	Applicable Requirement	Permit Cond. # 9.2.B	Limit/Standard ¹	Monitoring Method	MTRG ² Condition # 9.2. C				
Pollutant : VOC									

Page 81 of 88 Pages

# 32, Flotn. cells 2 in .	Rule 326. D.1, D.2, and E.3	(2)(iii)	Tank must be equipped with a vapor loss control device with a minimum vapor removal efficiency of 95%	Vapor loss control device (enclosed flare) inspection (also see Sec. 9.2)	(2)(a)(e)
	PTO 8166, Table 1		< 0.01 lb./hr & < 0.01 t/yr.	Recordkeeping & annual reporting	(2)(a)(e)
# 33, HC storage tank	Rule 326. D.1, D.2, and E.3	(2)(iii)	Tank must be equipped with a vapor loss control device with a minimum vapor removal efficiency of 95%	Vapor loss control device (e.g., enclosed flare) inspection (also see Sec. 9.2)	(2)(a)(e)
	PTO 8166, Table 1		< 0.01 lb./hr & < 0.01 t/yr.	Recordkeeping & annual reporting	(2)(a)(e)
#'s 16, 31,40 fug.emis. compnts.	PTO 8166, Table 1		2.54 lbs/hr, 60.96 lbs/day &11.14 t/yr. (Actual emissions based on number of wells and gas-oil ratio)	Recordkeeping & annual reporting	(2)(a)(b)(c)
#s 13-15 & 28-30 fug. emis.	ATC 9128, Table 1		0.88 lb/hr,21.12 lbs/day & 3.87 t/yr. (Emissions based on actual number of fug. em. components)	Recordkeeping & annual reporting	(2)(a)(b)(c)
# 48 fug. emis. compnts.	ATC 8335		0.52 lb/hr, 12.48 lbs/day & 2.29 t/yr. (Emissions based on actual number of fug. em. components)	Recordkeeping & annual reporting	(2)(a)
# 36, Loading station	PTO 8166 Table 1		<0.01lb/hr & <0.01 t/yr.	Recordkeeping & annual reporting	(2)(d)

Table Notes: 1 -- Requirement summarized; refer to APCD Rule and Section § listed in Column 2 for full text. 2 -- "MTRG" stands for Monitoring.

9.7.B.1 Unit-Specific Emissions/Operations Limitation.

- (1) **Emission Limits** VOC emissions from the dehydration and storage units listed in Table 9.7.B.2 shall not exceed the emission limits specified in Table 9.7.B.1 for relevant units. Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit. [*Reference: SoCalGas ATC 9128*]
- (2) **OPERATIONAL LIMITS** The operational limits listed below shall apply to the dehydration, storage and metering units listed in Table 9.7.B.1. Compliance with these limits shall be assessed through compliance with the monitoring, recordkeeping and reporting conditions in this permit.
 - (a) **Dehydration/Storage Throughput Limitations**: Dehydration/storage throughput must not exceed: [*Reference: APCD Rule 206*]

Condensate Production (dry)

Gas Withdrawl Rate from wells (a)

Truck loading of condensate

Note: (a) Rate is calculated as monthly production divided by number of producing days.

(b) **Vapor Recovery System Operation**: Any volatile organic compound (VOC) liquid may not be stored in the hydrocarbon storage tank (ID# 33) listed in Table 9.7.B.1, unless the tank is equipped with a vapor loss control device having a vapor removal efficiency of at least 95% by weight, e.g., a vapor recovery unit assisted by a flare. Vapor recovery systems, including all piping, valves, and fittings shall be operated in a leak-free condition to minimize the release of reactive organic vapors. [Reference: APCD Rule 326]

Page 82 of 88 Pages

- (c) **Tank Cleanout:** Vapor recovery shall be used on tanks so equipped during filling or flushing and emptying procedures, prior to opening tanks for cleanouts. [Reference: APCD Rule 326 B.3.b.4)]
- (d) **Loading Rack**: Hydrocarbon condensates shall not be transferred to an organic liquid cargo vessel unless a submerged or bottom load filling technique is used. [*Reference: APCD Rule 346 D.1*]
- (e) **Liquid Hydrocarbon Transport**: Organic liquids shall not be transported in organic liquid cargo carriers unless all hatches, valves and fittings are closed. [*Reference: APCD Rule 346 E.3*]
- (f) **Odorant Tank Filling**: Emissions of VOCs to the atmosphere resulting from tank filling operations shall be reduced by passing displaced vapors through a vapor recovery system with a control efficiency greater than 90 percent. Odorant emissions shall not be detectable, by olfactory senses, at or beyond the property boundary at any time during tank filling operations. [Reference: SoCalGas ATC 8335]

Page 83 of 88 Pages

9.7.B.2 Unit-Specific Compliance Monitoring

- (1). **Source Testing** The dehydration/storage/metering equipment listed in Table 9.7.B.1 of permit are not subject to any source testing requirements
- (2) **Periodic Monitoring** SoCalGas will monitor the following operational and process parameters:
 (a) **API Gravity & True Vapor Pressure Of Stored HC** The API gravity and the true vapor pressure at the maximum expected storage temperature of the stored liquid hydrocarbon (condensate) in each storage tank shall be measured and recorded *annually*. Alternately, the Reid vapor pressure of the stored condensate may be measured by the ASTM D 323 Standard Method and the true vapor pressure calculated by API Bulletin 2517, or equivalent APCD-approved Reid/True vapor pressure correlation. The calculated true vapor pressure shall be based on the maximum expected operating temperature for each hydrocarbon condensate storage tank. This temperature shall also be recorded. [*Reference: APCD Rule 326.J,K*]
 - (b) **Vented Reservoir Gas** SoCalGas shall estimate the total amount of reservoir gas, in scf, vented to the atmosphere resulting from the pipeline depressurizing operations, and the non-methane hydrocarbon (NMHC) content of the vented reservoir gas as determined for gaseous fuels (by gas-liquid chromatography analysis). [*Reference: APCD PTO 8166*]
 - (c) **Volume Of Gas Withdrawal** SoCalGas shall measure the volume of gas withdrawn each month (in units of scf) and the number of days that gas was withdrawn. [*Reference: APCD PTO 8166*]
 - (d) **Volume Of Condensate Trucked** The volumes of hydrocarbon condensate going to each truck from the truck loading rack. [*Reference: APCD PTO 8166*]
 - (e) **Volume Of Condensate Produced** The volume of hydrocarbon condensate produced annually. [*Reference: APCD PTO 8166*]

9.7.B.3 RECORDKEEPING

The records listed below shall be maintained, for a minimum of five (5) years, by SoCalGas and shall be made available to the APCD upon request. [Reference: APCD Rule 1303.D.1.f]

- (1) **Condensate Volume** The volume of hydrocarbon condensate produced annually. [*Reference: APCD PTO 8166*]
- (2) **API Gravity & Vapor Pressure** The API gravity and true vapor pressure at the maximum expected storage temperature of the stored hydrocarbon condensate storage tank, as monitored by SoCalGas. [*Reference: APCD PTO 8166*]
- (3) **Condensate Shipment Volumes** Volumes and dates of hydrocarbon condensate shipments from the truck loading rack and the total number of loads trucked from the facility. [*Reference: APCD PTO 8166*]
- (4) **Gas Withdrawal** The volume of gas withdrawn each month (in units of scf) and the number of days that gas was withdrawn. [Reference: APCD PTO 8166]
- (5) **Volume of NMHC Vented** The non-methane hydrocarbon (NMHC) content of the vented reservoir gas as determined for gaseous fuels (by gas-liquid chromatography analysis) used at the La Goleta station and the estimated volume of vented reservoir gas. [Reference: APCD PTO 8166]
- (6) **Volume of Coatings and Solvents** The amount of coatings and solvents used *annually*. This information must be logged for each coating and solvent. The log shall list (for each material) the

Page 84 of 88 Pages

quantity of material used, the volatile organic compound (VOC) content, whether the material is photochemically reactive per the definition of Rule 102.FF, and whether the material was applied to a surface or disposed of. A Material Safety Data Sheet (MSDS) or other product specification sheet, which specifies the VOC content of the material, shall be maintained with the log. [Reference: APCD Rule 317.B,322, 324]

SoCalGas may keep the log of solvent/coating use on a stationary source basis. Additionally, purchase and disposal records may be used to quantify solvents/coatings used and/or disposed of an annual basis.

- (7) **Maintenance Records** Maintenance records where excess emissions occur during cleanups and other maintenance activities exempted by Sections B.3 and B.5 of Rule 326. These records contain, at a minimum, the following: [Reference: APCD Rule 326.J.1.c]
 - (a) **Tank Identification**: Tank identification type of vapor controls used, and initials of personnel performing maintenance.
 - (b) Maintenance Performed: Description of maintenance procedure performed.
 - (c) **Estimated Excess Emissions**: Excess emissions caused by maintenance and how determined.
 - (d) Maintenance Dates & Times: Times and dates of maintenance procedure.

9.7.B.4 Reporting

Annual Reporting — By March 1 of each year, a report detailing the previous calendar year's activities shall be provided by SoCalGas to the APCD (Attn.: RCD Annual Report Coordinator). The report shall list all data generated pursuant to the Recordkeeping conditions 9.2.4 (a) through (f) of this permit. The data shall be summarized on monthly basis as required by 9.2.4 (d) and on annual basis as required by the rest of the recordkeeping conditions listed above. [Reference: SoCalGas PTO 8166]

Page 85 of 88 Pages

THIS PAGE LEFT VACANT INTENTIONALLY

Page 86 of 88 Pages

SECTION 10

[ATTACHMENTS]

Page 87 of 88 Pages

10.1 Appendix 1

10.1.A. PTO 6819 [as issued on 6/29/89]

10.1.B. PTO 7500 [as issued on 6/3/97]

10.1.C. PTO 8008 [as issued on 6/2/97]

10.1.D. PTO 8166 [as issued on 6/2/97]

10.1.E. PTO 8946 [as issued on 6/2/97]

10.1.F. PTO 9075 [as issued on 6/2/97]

10.1.G. PTO 9162 [as issued on 6/2/97]

10.1.H. PTO 9275 [as issued on 6/2/97]

10.1.I Compliance Plan: Form 1302-I

10.1.J Compliance Plan Certification: Form 1302-J

Page 88 of 88 Pages

10.2 Emission Calculation Documentation

All calculations for criteria pollutant emissions are documented in the "Reevaluation Analyses," which are part of the eight (8) SoCalGas PTOs included in Appendix 1, preceding this section. These evaluations are presented in the following pages. Note that the calculation of HAP emissions from the IC engines are provided on Pages 18 through 20 of Section 4.2 of this permit.

Page 1

10.3 Appendix 2: Equipment List And Associated Emissions

A listing of all equipment operated at SoCalGas' La Goleta stationary source is provided in the following pages. The permitted emissions from each emissions unit is also listed for convenient reference .

Page 2